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GOVERNOR



HAROLD LEGGETT, PH.D.
SECRETARY

State of Louisiana

DEPARTMENT OF ENVIRONMENTAL QUALITY ENVIRONMENTAL SERVICES

Certified Mail No.

Activity No.: PER20070043
Agency Interest No. 2083

Sarah B. Thigpen
Responsible Care Leader
Union Carbide Corporation
PO Box 50
Hahnville, LA 70057-0050

RE: Part 70 Operating Permit, Union Carbide Corp - St Charles Operations, Environmental Operations Plant (EnvOps), Union Carbide Corp, Taft, St. Charles Parish, Louisiana

Dear Mrs. Thigpen:

This is to inform you that the permit renewal/modification for the above referenced facility has been approved under LAC 33:III.501. The permit is both a state preconstruction and Part 70 Operating Permit. The submittal was approved on the basis of the emissions reported and the approval in no way guarantees the design scheme presented will be capable of controlling the emissions as to the types and quantities stated. A new application must be submitted if the reported emissions are exceeded after operations begin. The synopsis, data sheets and conditions are attached herewith.

It will be considered a violation of the permit if all proposed control measures and/or equipment are not installed and properly operated and maintained as specified in the application.

Operation of this facility is hereby authorized under the terms and conditions of this permit. This authorization shall expire at midnight on the _____ of _____, 2014, unless a timely and complete renewal application has been submitted six months prior to expiration. Terms and conditions of this permit shall remain in effect until such time as the permitting authority takes final action on the application for permit renewal. The permit number and agency interest number cited above should be referenced in future correspondence regarding this facility.

Please be advised that pursuant to provisions of the Environmental Quality Act and the Administrative Procedure Act, the Department may initiate review of a permit during its term. However, before it takes any action to modify, suspend or revoke a permit, the Department shall, in accordance with applicable statutes and regulations, notify the permittee by mail of the facts or operational conduct that warrant the intended action and provide the permittee with the opportunity to demonstrate compliance with all lawful requirements for the retention of the effective permit.

Done this _____ day of _____, 2009.

Permit No.: 2104-V2

Sincerely,

Cheryl Sonnier Nolan
Assistant Secretary

CSN:LND
c: EPA Region VI

**AIR PERMIT BRIEFING SHEET
AIR PERMITS DIVISION
LOUISIANA DEPARTMENT OF ENVIRONMENTAL QUALITY**

Union Carbide Corp - St Charles Operations

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Union Carbide Corp

Taft, St. Charles Parish, Louisiana

I. Background

Union Carbide Corporation (UCC), a subsidiary of the Dow Chemical Company, operates the St. Charles EnvOps Plant also known as Wastewater Treatment Facility (WWTF), an existing chemical manufacturing facility that began operation prior to 1969. The WWTF currently operates under Permit No. 2104-V1, issued February 16, 2006.

This is the Part 70 operating permit renewal for the Environmental Operations Plant.

II. Origin

A permit application and Emission Inventory Questionnaire were submitted by UCC on February 20, 2008 requesting a Part 70 operating permit renewal/modification. Additional information dated October 17, November 21, and December 5, 2008, and February 12, 2009 was also received. An updated application dated June 17, 2009 and additional information dated July 1, 2009 was later received.

III. Description

The WWTF includes facilities for the handling and treatment of the plant's storm water and wastewater, the storage of hazardous and non-hazardous residues, and the loading of residues for off-site transport.

Wastewater is collected from the production or operating units at St. Charles Operations (SCO) and from the Amerchol facility in Greensburg, LA. Each production unit at SCO that generates process wastewater operates one or more process sewer sumps that accumulate process wastewater. All water accumulated in the gravity sewer system, including certain storm water, is pumped to the WWTF via a system of piped headers. Some process wastewater streams, particularly those containing odorous and volatile hydrocarbons, are pumped directly to the headers without contacting the gravity sewer systems.

Four (4) headers are routed to the WWTF, including stainless steel, old and new carbon steel, and transite headers. Each header routed to the WWTF is monitored for both total carbon (TC) and pH. When the total organic carbon concentration in any header exceeds its internal limit, or in high rainfall conditions, flow is diverted to a 2.5 million gallon surge tank (EIQ No. 199K). Material in the surge tank is returned to the headworks of the WWTF at a controlled rate to minimize fluctuations in the hydraulic and organic loads to the biological system.

With the maximum aeration capacity of the current system at 4600 hp, the system can treat up to

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110,000 lb TC/day. By monitoring the influent feed rate and maintaining the TC load at 110,000 lb/day or less, the system has historically achieved approximately 99% removal of organics. The industry standard for organic removal in "well operated" biological treatment systems is 95%. The annual average feed rate is typically closer to 55,000 lb TC/day.

Wastewater entering the WWTF is fed to two (2) pH adjustment tanks. Wastewater from the pH adjust tanks is routed to three (3) primary clarifiers. Wastewater overflowing the clarifier weirs drains by gravity to an equalization sump tank (EIQ No. 199L). From there it is pumped to an equalization tank (EIQ No. 199M). The pH adjustment tanks and the primary clarifiers are open-topped while the surge and equalization tanks are a covered system with one vent (EIQ No. 3233-Equalization and Surge Wastewater Treatment Header).

After primary treatment, the wastewater enters two (2) 10 million gallon air stabilization basins. These basins receive feed from the equalization tank or the surge tank, stormwater sump, and recycle from the secondary clarifiers. Effluent from the air stabilization basins is pumped to three (3) aeroflocculators and then to three (3) secondary clarifiers. Water overflowing the weirs on the secondary clarifiers is discharged to the Mississippi River through an internal collection system in accordance with the state wastewater permit.

Both hazardous and non-hazardous residues generated in the operating units at the Taft facility are stored in six (6) above ground, fixed-roof storage tanks. Residues are shipped offsite via a tank truck vapor-balanced loading rack.

UCC proposes the following:

- To convert the UNOX tanks (EIQs 3204-3215, Process Vessels 11-13, 21-23, 31-33, 41-43) to surge capacity service, including a new wastewater header and sump tank, and remove the UNOX CAP as these tanks have changed service. Their emissions will be permitted under the cap GRP153, (EIQ WWTF-CAP).
- Update of Wastewater Treatment Facility emissions using EPA's Water9 Model and UCC's most current knowledge of Residue and Wastewater Compositions. This update is responsible for the increase in toxic air emissions above their minimum emissions rate, (MER).
- Deletion of storage tank 1519 (EIQ No. 199H), Diesel Pump 1 (EIQ 3217) and Diesel Pump 2 (EIQ No. 3218).
- Update of all residue Storage Tank calculations to reflect current materials stored and current material compositions.
- Include in cap, WWTF-CAP, existing tanks, EIQs 3228-3232 & 3234-3247, sump tanks EIQs 3248-3264; and reconcile emissions.

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- Reconcile into the permit six (6) existing firewater diesel pumps operated as emergency back-up firewater pumps to maintain firewater pressure in an emergency. Additionally, Firewater Pump #3 will be reconstructed.
- Include sumps (EIQs 3248-3264) as part of WWTF CAP except for LATEX sumps (EIQs 3266 and 3267).
- Add insignificant activities as per LAC 33:III.501.B.5.A.3.

Estimated emissions in tons per year are as follows:

<u>Pollutant</u>	<u>Before</u>	<u>After</u>	<u>Change</u>
PM ₁₀	2.77	2.52	-0.25
SO ₂	2.58	2.88	0.30
NO _x	39.01	36.43	-2.58
CO	8.41	7.88	-0.53
VOC *	277.52	153.09	-124.43

VOC LAC 33:III Chapter 51 Toxic Air Pollutants (TAPs):

<u>Pollutant</u>	<u>Before</u>	<u>After</u>	<u>Change</u>
Acetaldehyde	6.24	38.31	32.07
Acetonitrile	-	<0.01	<0.01
Acetophenone	0.08	<0.01	-0.08
Acrolein	0.18	0.03	-0.15
Acrylic Acid	3.26	0.32	-2.94
Benzene	0.78	0.94	0.16
Biphenyl	0.01	0.03	0.02
Bis(2-ethylhexyl)phthalate	-	<0.01	<0.01
1,3 Butadiene	0.14	<0.001	-0.14
n-Butyl alcohol	2.51	61.20	58.69
Carbon Tetrachloride	<0.01	0.04	0.04
Chloroform	<0.01	0.04	0.04
Chloromethane	-	0.01	0.01
Cresol	-	<0.01	<0.01
Cumene	0.02	-	-0.02
1,2-Dichloroethane	-	0.41	0.41

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VOC LAC 33:III Chapter 51 Toxic Air Pollutants (TAPs):

Pollutant	Before	After	Change
1,4-Dioxane	0.88	0.71	-0.17
Dibutyl Phthalate	0.04	<0.01	-0.04
Diethanolamine	<0.01	-	-<0.01
Di (2-ethylhexyl)Phthalate	0.04	<0.01	-0.04
Ethyl Acrylate	3.53	0.42	-3.11
Ethylbenzene	0.13	0.01	-0.12
Ethylene Dichloride	0.83	-	-0.83
Ethylene Glycol	0.38	0.84	0.46
Ethylene Oxide	3.84	4.79	0.95
Formaldehyde	2.60	0.50	-2.1
Glycol Ethers (II)	0.70	<0.01	-0.7
Glycol Ethers (IIS)	0.23	-	-0.23
n-Hexane	0.11	<0.01	-0.11
Hydroquinone	2.81	0.02	-2.79
Methanol	7.64	5.15	-2.49
Methyl Ethyl Ketone	<0.01	0.01	0.01
Naphthalene	0.17	0.46	0.29
PAH	-	0.008	0.008
Phenol	0.06	0.01	-0.05
Phthalic Anhydride	0.27	<0.01	-0.27
Propionaldehyde	0.09	5.14	5.05
Pyridine	<0.01	<0.01	0
Styrene	0.16	0.06	-0.1
Toluene	0.38	0.38	0
Vinyl Acetate	<0.01	10.04	10.04
Vinyl Chloride	<0.01	0.17	0.17
Xylenes	0.65	0.03	-0.62
Acrylamide	<0.01	-	-<0.01
Acrylonitrile	<0.01	-	-<0.01
Aniline	<0.01	-	-<0.01
Anthracene	<0.01	-	-<0.01
Carbon Disulfide	<0.01	-	-<0.01
Carbonyl Sulfide	<0.01	-	-<0.01
Chlorobenzene	<0.01	-	-<0.01
1,2-Epoxybutane	<0.01	-	-<0.01
Methyl Isobutyl Ketone	<0.01	-	-<0.01
Phenylenediamine	<0.01	-	-<0.01

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VOC LAC 33:III Chapter 51 Toxic Air Pollutants (TAPs):

Pollutant	Before	After	Change
PCBs	<0.01	-	-<0.01
Styrene Oxide	<0.01	-	-<0.01
Trichloroethylene	<0.01	-	-<0.01
1,1,2-Trichloroethane	<0.01	-	-<0.01
2,2,4-Trimethylpentane	<0.01	-	-<0.01
TOTAL	38.76	130.08	+91.32

Other VOC (TPY): 23.01

Non-VOC TAPs

Pollutant	Before	After	Change
Methylene Chloride	<0.01	Delete	-<0.01
Sulfuric Acid	0.60	0.15	-0.45
Ammonia	27.38	27.38	-
Tetrachloroethene	<0.01	0.26	0.26
Chlorine	<0.01	-	-<0.01
Hydrochloric Acid	<0.01	-	-<0.01
Hydrogen Sulfide	<0.01	-	-<0.01
Nitric Acid	<0.01	-	-<0.01
1,1,1-Trichloroethane	<0.01	-	-<0.01
TOTAL	27.98	27.79	-0.19

The update of Wastewater Treatment Facility emissions using EPA's Water9 Model and UCC's most current knowledge of Residue and Wastewater Compositions is responsible for the increase in some toxic air emissions above their minimum emissions rate (MER).

IV. Type of Review

This permit was reviewed for compliance with 40 CFR 70, the Louisiana Air Quality Regulations, New Source Performance Standards (NSPS) and National Emission Standards for Hazardous Air Pollutants (NESHAP). Prevention of Significant Deterioration (PSD) does not apply.

This facility is a major source of toxic air pollutants (TAPs) pursuant to LAC 33:III, Chapter 51.

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V. Credible Evidence

Notwithstanding any other provisions of any applicable rule or regulation or requirement of this permit that state specific methods that may be used to assess compliance with applicable requirements, pursuant to 40 CFR Part 70 and EPA's Credible Evidence Rule, 62 Fed. Reg. 8314 (Feb. 24, 1997), any credible evidence or information relevant to whether a source would have been in compliance with applicable requirements if the appropriate performance or compliance test or procedure had been performed shall be considered for purposes of Title V compliance certifications. Furthermore, for purposes of establishing whether or not a person has violated or is in violation of any emissions limitation or standard or permit condition, nothing in this permit shall preclude the use, including the exclusive use, by any person of any such credible evidence or information.

VI. Public Notice

A notice requesting public comment on the permit was published in *The Advocate*, Baton Rouge, on XXXXX XX, 2009; and in the *St. Charles Herald Guide*, Boutte, on XXXXXXXX XX, 2009. A copy of the public notice was mailed to concerned citizens listed in the Office of Environmental Services Public Notice Mailing List on XXXXX XX 2009. The draft permit was also submitted to US EPA Region VI on XXXXX XX, 2009. All comments will be considered prior to the final permit decision.

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VII. Effects on Ambient Air

Emissions associated with the proposed renewal/modification were reviewed by the Air Quality Assessment Division to ensure compliance with the NAAQS and AAS

Dispersion Model(s) Used: None

Pollutant	Time Period	Calculated Maximum Ground Level Concentration	Louisiana Toxic Air Pollutant Ambient Air Quality Standard or (National Ambient Air Quality Standard : {NAAQS})

VIII. General Condition XVII Activities

Work Activity	Schedule	PM ₁₀	Emission Rates - tons			
			SO ₂	NO _x	CO	VOC
Sampling Procedures	5000 samples/yr	-	-	-	-	0.01

IX. Insignificant Activities

ID No.	Description	Citation
No. 1	Firewater Diesel Pump Tank (720 gals)	LAC 33:III.501.B.5.A.3
No. 2	Firewater Diesel Pump Tank (520 gals)	LAC 33:III.501.B.5.A.3
No. 3	Firewater Diesel Pump Tank (275 gals)	LAC 33:III.501.B.5.A.3
No. 4	Firewater Diesel Pump Tank (520 gals)	LAC 33:III.501.B.5.A.3
No. 5	Firewater Diesel Pump Tank (720 gals)	LAC 33:III.501.B.5.A.3
No. 6	Firewater Diesel Pump Tank (520 gals)	LAC 33:III.501.B.5.A.3

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Table 1. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	LAC 33:III Chapter																
		5▲	509	9	11	13	15	2103	2107	2111	2113	2115	2121	2153	29*	51*	53*	56
AJ-2083	UCC Facility Wide			1	1	1									1	1	1	1
UNF009	WWTF														1	1		
EQT0033	199A - Residue Tank (ID-1513)							1							1			
EQT007	199B - Residue Tank (ID-1514)							1							1			
EQT008	199A - Carbon Canister																	
EQT009	199B - Carbon Canister																	
EQT010	199C - Residue Tank (ID-1515)							3							1			
EQT011	199D - Residue Tank (ID-1516)							3							1			
EQT012	199F - Residue Tank (ID-1517)							3							1			
EQT013	199G - Residue Tank (ID-1518)							1							1			
EQT014	199G -Carbon Canister																	
EQT015	199J - Surge Sump Tank							3							1			
EQT017	199K - Equalization Sump Tank								3						1			
EQT018	199L-Wastewater Surge Tank								3						1			
EQT019	199M- Wastewater Equalization Tank								3						1			
EQT020	3201-Sulfuric Acid Storage Tank									3					1			
EQT021	3204 - Process Vessel 11									3					1			
EQT022	3205 - Process Vessel 12										3				1			
EQT023	3206 - Process Vessel 13										3				1			
EQT024	3207 - Process Vessel 21										3				1			
EQT025	3208 - Process Vessel 22										3				1			
EQT026	3209- Process Vessel 23										3				1			

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ID No.:	Description	LAC 33:III.Chapter																	
		5▲	509	9	11	13	15	2103	2107	2111	2113	2115	2121	2153	29*	51*	53*	56	59*
EQT0927	3210- Process Vessel 31																		
EQT0928	3211- Process Vessel 32																		
EQT0929	3212 - Process Vessel 33																		
EQT0930	3213 - Process Vessel 41																		
EQT0931	3214 - Process Vessel 42																		
EQT0932	3215 - Process Vessel 43																		
EQT0933	3219 - Diesel Pump 3																		
EQT0934	3220 - No 1 Firewater Diesel Pump																		
EQT0935	3221 - No. 2 Firewater Diesel Pump																		
EQT0936	3222 - No. 3 Firewater Diesel Pump																		
EQT0937	3223 - No. 4 Firewater Diesel Pump																		
EQT0938	3224 - Return Firewater Diesel Pump																		
EQT0939	3225 - No. 6 Firewater Diesel Pump																		
EQT0940	3226 - Sump Tank																		
EQT0941	3227 - UNOX Vent Collection Header																		
EQT0942	3228 - North pH Adjustment WW Tank																		
EQT0943	3229 - South pH Adjustment WW Tank																		
EQT0944	3230 - East Primary Clarifier																		
EQT0945	3231 - Center Primary Clarifier																		
EQT0946	3232 - West Primary Clarifier																		
EQT0947	3233 - Equalization and Surge Wastewater Tank Header																		
EQT0948	3234 - North Air Stabilization Basin																		
EQT0949	3235 - South Air Stabilization Basin																		

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ID No.:	Description	LAC 33:III, Chapter																
		5▲	509	9	11	13	15	2103	2107	2111	2113	2115	2121	2153	29*	51*	53*	56
EQT0950	3236 - North Flocculation Tank							3										1
EQT0951	3237 - South Flocculation Tank							3										1
EQT0952	3238 - Southeast Flocculation Tank							3										1
EQT0953	3239 -North Secondary Clarifier							3										1
EQT0954	3240 - South Secondary Clarifier							3										1
EQT0955	3241 -Southeast Secondary Clarifier							3										1
EQT0956	3242 -Storm Sump															3		1
EQT0957	3243 - Digester															3		1
EQT0958	3244 - Dewatering															3		1
EQT0959	3245 - East Stormwater PPTB															3		1
EQT0960	3246 - West Stormwater PPTB															3		1
EQT0961	3247 - Settling Basin															3		1
EQT0962	3248 - E-1 Olefins 1 Sump															3		1
EQT0963	3249 - E-2 EA-1 Sump															3		1
EQT0964	3250 - E-3A Oxide 1 Sump															3		1
EQT0965	3251 - E-3B Oxide 2 Sump															3		1
EQT0966	3252 - E-3C Oxide Tank Car Sump															3		1
EQT0967	3253 - E-5 Site No. 1 Shipping Sump															3		1
EQT0968	3254 - E-6 Butanol 1 Sump															3		1
EQT0969	3255 - E-7 Acrylics Sump															-3		1
EQT0970	3256 - E-8 Butanol Sump															3		1
EQT0971	3257 - E-11 Site No. 4 T/C Sump															3		1
EQT0972	3258 - E-17 EA-2 Flare Sump															3		1
EQT0973	3259 - E-18 Site Logistics Sump A															3		1

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Table 1. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	LAC 33:III Chapter															29*	51*	53*	56	59*
		5▲	509	9	11	15	15	2103			2107	2111	2113	2115	2121	2153					
EQT0974	3260 - E-19 Site Logistics Sump B																3	1			
EQT0975	3262 - E-21 Olefins 2 Sump																3	1			
EQT0976	3263 - E-22 EA-2 Sump																3	1			
EQT0977	3264 - E-24A SPU WW Sump																3	1			
EQT0978	3266 - E-28A SE Corner of Latex Block Sump																3	1			
EQT0979	3267 - E-28B SW Corner of Latex Block Sump																3	1			
EQT982	200-Tank Truck Loading																3	1			
FUG0020	196S - Fugitives																	1	1		
GRP0153	WWTF - CAP																	1	1		

* The regulations indicated above are State Only regulations.

▲ All LAC 33:III Chapter 5 citations are federally enforceable including LAC 33:III.501.C.6 citations, except when the requirement found in the "Specific Requirements" report specifically states that the regulation is State Only.

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KEY TO MATRIX

- 1 - The regulations have applicable requirements that apply to this particular emission source.
-The emission source may have an exemption from control stated in the regulation. The emission source may not have to be controlled but may have monitoring, recordkeeping, or reporting requirements.
- 2 - The regulations have applicable requirements that apply to this particular emission source but the source is currently exempt from these requirements due to meeting a specific criterion, such as it has not been constructed, modified or reconstructed since the regulations have been in place. If the specific criteria changes the source will have to comply at a future date.
- 3 - The regulations apply to this general type of emission source (i.e. vents, furnaces, towers, and fugitives) but do not apply to this particular emission source.
Blank - The regulations clearly do not apply to this type of emission source.

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X. Table 1. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	40 CFR 60 NSPS						40 CFR 61						40 CFR 63 NESHPAP						40 CFR					
		A	Kb	VV	III	A	M	FF	A	F	G	H	XX	YY	PPP	EE	FFF	ZZZ	GGG	Z	GG	64	68	70	82
AI-2083	UCC Facility Wide	1				1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
UNF009	WWTF												3	3	3	3	3	3	3	3	3	2	2	1	1
EQT0033	199A - Residue Tank (ID-1513)	3										3	3	3	3	3	3	3	3	3	3	3	3	3	3
EQT007	199B - Residue Tank (ID-1514)	1	1									3	3	3	3	3	3	3	3	3	3	3	3	3	3
EQT008	199A - Carbon Canister																								
EQT009	199B - Carbon Canister																								
EQT00910	199C - Residue Tank (ID-1515)	3										3	3	3	3	3	3	3	3	3	3	3	3	3	3
EQT00911	199D - Residue Tank (ID-1516)	3										3	3	3	3	3	3	3	3	3	3	3	3	3	3
EQT00912	199F - Residue Tank (ID-1517)	3										3	3	3	3	3	3	3	3	3	3	3	3	3	3
EQT00913	199G - Residue Tank (ID-1518)	1	1									3	3	3	3	3	3	3	3	3	3	3	3	3	3
EQT00914	199G -Carbon Canister																								
EQT00915	199J - Surge Sump Tank	3																							
EQT00917	199K - Equalization Sump Tank	3																							
EQT00918	199L-Wastewater Surge Tank	3																							
EQT00919	199M- Wastewater Equalization Tank	3																							
EQT00920	320 i-Sulfuric Acid Storage Tank	3																				3			
EQT00921	3204 - Process Vessel 11	3																							

LOUISIANA DEPARTMENT OF ENVIRONMENTAL QUALITY

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Emergency Interest Rates

The Social and Political Thought of John C. Calhoun

X Table 1. Applicable Louisiana and Federal Air Quality Requirements

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Union Carbide Corp - St Charles Operations
Agency Interest No.: 2083

**Union Carbide Corp
Taft, St. Charles Parish, Louisiana**

X. Table 1. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	40 CFR 60 NSPS												40 CFR 63 NESHPAP												40 CFR			
		A	Kb	VV	III!	A	M	FF	A	F	G	H	XX	YY	PPP	EE	FFF	ZZZ	GGG	64	68	70	82						
EQT0938	3224 - Return Firewater Diesel Pump																												
EQT0939	3225 - No. 6 Firewater Diesel Pump																												
EQT0940	3226 - Sump Tank Header																												
EQT0941	3227 - UNOX Vent Collection Header																												
EQT0942	3228 - North pH Adjustment WW Tank																												
EQT0943	3229 - South pH Adjustment WW Tank																												
EQT0944	3230 - East Primary Clarifier																												
EQT0945	3231 - Center Primary Clarifier																												
EQT0946	3232 - West Primary Clarifier																												
EQT0947	3233 - Equalization and Surge Wastewater Tank Header																												
EQT0948	3234 - North Air Stabilization Basin																												
EQT0949	3235 - South Air Stabilization Basin																												
EQT0950	3236 - North Flocculation Tank																												
EQT0951	3237 - South Flocculation Tank																												
EQT0952	3238 - Southeast Flocculation Tank																												
EQT0953	3239 - North Secondary Clarifier																												

LOUISIANA DEPARTMENT OF ENVIRONMENTAL QUALITY**Union Carbide Corp - St Charles Operations**

Agency Interest No.: 2083

Union Carbide Corp**Taft, St. Charles Parish, Louisiana****X. Table 1. Applicable Louisiana and Federal Air Quality Requirements**

ID No.:	Description	40 CFR 60 NSPS			40 CFR 61			40 CFR 63 NESHAP			40 CFR			40 CFR			40 CFR					
		A	Kb	VV	III	A	M	FF	A	F	G	H	XX	YY	PPP	EE	FFF	ZZZ	GGG	64	68	70
EQT0954	3240 - South Secondary Clarifier	3																				
EQT0955	3241 - Southeast Secondary Clarifier	3																				
EQT0956	3242 -Storm Sump																					
EQT0957	3243 - Digester	3																				
EQT0958	3244 - Devaterring																					
EQT0959	3245 - East Stormwater PPTB	3																				
EQT0960	3246 - West Stormwater PPTB	3																				
EQT0961	3247 - Settling Basin	3																				
EQT0962	3248 - E-1 Olefins 1 Sump																					
EQT0963	3249 - E-2 EA-1 Sump																					
EQT0964	3250 - E-3A Oxide 1 Sump																					
EQT0965	3251 - E-3B Oxide 2 Sump																					
EQT0966	3252 - E-3C Oxide Tank Car Sump																					
EQT0967	3253 - E-5 Site No. 1 Shipping Sump																					
EQT0968	3254 - E-6 Butanol 1 Sump																					
EQT0969	3255 - E-7 Acrylics Sump																					
EQT0970	3256 - E-8 Butanol Sump																					

LOUISIANA DEPARTMENT OF ENVIRONMENTAL QUALITY

Union Carbide Corp - St Charles Operations
 Agency Interest No.: 2083
Union Carbide Corp
Taft, St. Charles Parish, Louisiana

X. Table 1. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	40 CFR 60 NSPS												40 CFR 61												40 CFR			
		A	Kb	VV	III	A	M	F	A	F	G	H	XX	YY	PPP	EE	FFF	ZZZ	GGG	GG	64	68	70	82					
EQT0971	3257 - E-11 Site No. 4 T/C Sump																												
EQT0972	3258 - E-17 EA-2 Flare Sump																												
EQT0973	3259 - E-18 Site Logistics Sump A																												
EQT0974	3260 - E-19 Site Logistics Sump B																												
EQT0975	3262 - E-21 Olefins 2 Sump																												
EQT0976	3263 - E-22 EA-2 Sump Olefins 2 Sump																												
EQT0977	3264 - E-24A SPU WW Sump																												
EQT0978	3266 - E-28A SE Corner of Latex Block Sump																												
EQT0979	3267 - E-28B SW Corner of Latex Block Sump																												
EQT0982	200-Tank Truck Loading																												
FUG0020	196S - Fugitives																												
GRP0153	WWTF - CAP																												

LOUISIANA DEPARTMENT OF ENVIRONMENTAL QUALITY

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KEY TO MATRIX

- 1 -The regulations have applicable requirements that apply to this particular emission source.
-The emission source may have an exemption from control stated in the regulation. The emission source may not have to be controlled but may have monitoring, recordkeeping, or reporting requirements.
- 2 -The regulations have applicable requirements that apply to this particular emission source but the source is currently exempt from these requirements due to meeting a specific criterion, such as it has not been constructed, modified or reconstructed since the regulations have been in place. If the specific criteria changes the source will have to comply at a future date.
- 3 -The regulations apply to this general type of emission source (i.e. vents, furnaces, towers, and fugitives) but do not apply to this particular emission source.

Blank – The regulations clearly do not apply to this type of emission source.

LOUISIANA DEPARTMENT OF ENVIRONMENTAL QUALITY**Union Carbide Corp - St Charles Operations****Agency Interest No.: 2083****Union Carbide Corp****Taft, St. Charles Parish, Louisiana****XI. Table 2. Explanation for Exemption Status or Non-Applicability of a Source**

ID No:	Requirement	Notes
UNF009	NESHAP Subpart F - National Emission Standards for Organic Hazardous Air Pollutants From the Synthetic Organic Chemical Manufacturing Industry [40 CFR 63.100]	DOES NOT APPLY. WWTF is not a SOCMICMPU.
WWTF	NESHAP Subpart XX - National Emission Standards For Ethylene Manufacturing Process Units: Heat Exchange Systems and Waste Operations [40 CFR 63.1080]	DOES NOT APPLY. WWTF is not an ethylene production unit.
	NESHAP Subpart YY - National Emission Standards for Hazardous Air Pollutants for Source Categories: Generic Maximum Achievable Control Technology Standards [40 CFR 63.1100]	DOES NOT APPLY. WWTF is not an ethylene production unit.
	NESHAP Subpart PPP - National Emission Standards for Hazardous Air Pollutants for Polyether Polyols Production [40 CFR 63.1420]	DOES NOT APPLY. WWTF is not an ethylene production unit.
	NESHAP Subpart EEEE - National Emission Standard for Hazardous Air Pollutants: Organic Liquids Distribution (OLD) (Non-Gasoline) [40 CFR 63.2330]	DOES NOT APPLY. WWTF is does not handle organic liquids.
	NESHAP Subpart FFFF - National Emission Standard for Hazardous Air Pollutants: Miscellaneous Organic Chemical Manufacturing [40 CFR 63.2430]	DOES NOT APPLY. WWTF does not meet the definition of a MCPU.

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XI. Table 2. Explanation for Exemption Status or Non-Applicability of a Source

ID No:	Requirement	Notes
UNF009 WWTF Continuation	Compliance Assurance Monitoring (CAM) [40 CFR 64.2]	DOES NOT APPLY. WWTF has no emissions units that meet the applicable criteria
GRP153 WWTF CAP (Includes EQT941[e07921-912] EQT947[e07915-919] EQT940, EQT942-946 EQT948-977)	Limits Volatile Organic Compound (VOC) Emissions From Industrial Wastewater [LAC 33:2153]	DOES NOT APPLY. Applies to facilities located in ozone non-attainment areas. UCC is located in St. Charles Parish which is designated as attainment for ozone.
FUG020 196S-Fugitive Emissions	NESHAP for Source Categories Subparts F & H- Equipment Leaks [40 CFR63.160-189]	DOES NOT APPLY. Piping in WWTF is not used to convey any raw materials or products within a CMFU applicable to the HON.
EQT033 199A-Residue Tank	NSPS Subpart Kb – Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels for Which Construction, Reconstruction, or Modification Commenced after July 23, 1984. [40 CFR 60.110b]) NESHAP for SOCM1 HON Subpart F [40 CFR 63.100]	DOES NOT APPLY. Tank capacity less than 75 m ³ (< 19,813 gal).
		DOES NOT APPLY. Tank is a piece of equipment that does not meet the definition of a CMFU. Tank stores wastes, not feeds, intermediates or products. Material in the tank does not meet the definition of a product. Stored material is a waste.

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XI. Table 2. Explanation for Exemption Status or Non-Applicability of a Source

ID No:	Requirement Provisions [40 CFR 63.119]	Notes
EQT033 199A-Residue Tank Cont:	NESHAP for SOCMI HON Subpart G. Storage Vessel Provisions [40 CFR 63.119] NESHAP for Source Categories Subpart EEEE – Organic Liquid Distribution MACT [40 CFR 63.2330-63.2406]	DOES NOT APPLY. Tank does not meet the definition of a storage vessel because tank is not associated with a CMPU
EQT907 EQ1913	NESHAP for Source Categories Subpart FFFF – Miscellaneous Organic Chemical Manufacturing MACT (MON) NESHAP for SOCMI HON Subpart F [40 CFR 63.100]	DOES NOT APPLY. Tank stores hazardous waste and is applicable to RCRA regulatory requirements; as such, it is not subject to Subpart EEEE.
199B & 199G Residue Tanks	NESHAP for SOCMI HON Subpart G. Storage Vessel! Provisions [40 CFR 63.119] NESHAP for Source Categories Subpart EEEE – Organic Liquid Distribution MACT [40 CFR 63.2330-63.2406]	DOES NOT APPLY. Tank is considered part of a HON CMPU; therefore, it is not associated with a MON CMPU.
	NESHAP for Source Categories Subpart FFFF – Miscellaneous Organic Chemical Manufacturing MACT (MON)	DOES NOT APPLY. Tanks are pieces of equipment that do not meet the definition of a CMPU. Tanks store wastes, not feeds, intermediates or products. Material in the tank does not meet the definition of a product. Stored material is a waste.
		DOES NOT APPLY. Tank does not meet the definition of a storage vessel because tank is not associated with a CMPU
		DOES NOT APPLY. Tank B stores hazardous waste and is applicable to RCRA regulatory requirements; as such, it is not subject to Subpart EEEE. Tank G stores materials that do not meet the definition of an organic liquid.
		DOES NOT APPLY. Tanks are considered part of a HON CMPU; therefore, it is not associated with a MON CMPU.

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XI. Table 2. Explanation for Exemption Status or Non-Applicability of a Source

ID No:	Requirement	Notes
EQT910	NSPS Subpart Kb—Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels for Which Construction, Reconstruction, or Modification Commenced after July 23, 1984. [40 CFR 60.110b]	DOES NOT APPLY. Tank capacity less than 75 m ³ (< 19,813 gal).
199C	NESHAP for SOCMHON Subpart F [40 CFR 63.100]	DOES NOT APPLY. Tank is a piece of equipment that does not meet the definition of a CMPU. Tank stores wastes, not feeds, intermediates or products. Material in the tank does not meet the definition of a product. Stored material is a waste.
199F	NESHAP for SOCMHON Subpart G, Storage Vessel Provisions [40 CFR 63.119]	DOES NOT APPLY. Tank does not meet the definition of a storage vessel because tank is not associated with a CMPU
Residue Tanks	NESHAP for Source Categories Subpart EEEE – Organic Liquid Distribution MACT [40 CFR 63.2330-63.2406]	DOES NOT APPLY. Materials stored do not meet the definition of an organic liquid
	NESHAP for Source Categories Subpart FFFF – Miscellaneous Organic Chemical Manufacturing MACT (MON) Storage of VOC Compounds [LAC 33:II.2103.A]	DOES NOT APPLY. Tank is considered part of a HON CMPU; therefore, it is not associated with a MON CMPU.
		DOES NOT APPLY. Vapor pressure of materials stored is less than 15 psia.

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XI. Table 2. Explanation for Exemption Status or Non-Applicability of a Source

ID No:	Requirement	Notes
EQT911	NSPS Subpart Kb – Standards of Performance for Volatile Organic Liquid Storage Vessels (including Petroleum Liquid Storage Vessels for Which Construction, Reconstruction, or Modification Commenced after July 23, 1984. [40 CFR 60.110b]	DOES NOT APPLY. Tank capacity > 75 m ³ and < 151 m ³ ; vapor pressure < 15 kPa (2.17 psia).
199D Residue Tank	NESHAP for SOCMI HON Subpart F [40 CFR 63.100]	DOES NOT APPLY. Tank is a piece of equipment that does not meet the definition of a CMPU. Tank stores wastes, not feeds, intermediates or products. Material in the tank does not meet the definition of a product.
	NESHAP for SOCMI HON Subpart G. Storage Vessel Provisions [40 CFR 63.119]	DOES NOT APPLY. Tank does not meet the definition of a storage vessel because tank is not associated with a MCPU
	NESHAP for Source Categories Subpart EEE – Organic Liquid Distribution MACT [40 CFR 63.2330-63.2406]	DOES NOT APPLY. Materials stored do not meet the definition of an organic liquid.
	NESHAP for Source Categories Subpart FFFF – Miscellaneous Organic Chemical Manufacturing MACT (MON) Storage of VOC Compounds [LAC 33:III.2103.A]	DOES NOT APPLY. Tank does not meet the definition of a storage vessel because tank is not associated with a MCPU. DOES NOT APPLY. Vapor pressure of materials stored is less than 1.5 psia.

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XI. Table 2. Explanation for Exemption Status or Non-Applicability of a Source

ID No:	Requirement	Notes
EQT915, EQT917, EQT918, EQT919	NSPS Subpart Kb – Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels for Which Construction, Reconstruction, or Modification Commenced after July 23, 1984. [40 CFR 60.110b]	DOES NOT APPLY as per 40 CFR 60.111b. Tanks do not meet the definition of storage vessel since they are process tanks.
199J, 199K, 199L, 199M Surge & Equalization Sump Tanks	Storage of VOC Compounds [LAC 33:III.2103.A]	DOES NOT APPLY. Vapor pressure of materials stored is less than 1.5 psia.
EQT982 200 Tank Truck Loading	NESHAP for SOCMHON Subpart F [40 CFR 63.100] NESHAP for SOCMHON Subpart G, Storage Vessel Provisions [40 CFR 63.126.c] NESHAP for Source Categories Subpart EEE – Organic Liquid Distribution MACT [40 CFR 63.2330-63.2406]	DOES NOT APPLY. Loading point does not meet the definition of a CMPU. Tank Truck loading does not transfer products. Only waste streams are loaded. Material loaded does not meet the definition of a product. DOES NOT APPLY. Material loaded is waste. The HON applies to product loaded, and this material is not product but waste. DOES NOT APPLY. Materials stored do not meet the definition of an organic liquid
	Control of Emission of Organic Compounds – VOC Loading [LAC 33:III.2107.A]	EXEMPT from the requirement of LAC 33:III.2107.A as facility loads < 20,000 gallons/day of VOCs with vapor pressure > 1.5 psia.

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XI. Table 2. Explanation for Exemption Status or Non-Applicability of a Source

ID No:	Requirement	Notes
EQT920	NSPS Subpart Kb – Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels for Which Construction, Reconstruction, or Modification Commenced after July 23, 1984. [40 CFR 60.110b]	DOES NOT APPLY. Tank does not store VOCs.
3201	NESHAP for Source Categories Subpart FFFF – Miscellaneous Organic Chemical Manufacturing MACT (MON)	DOES NOT APPLY. Tank does not store HAPs.
Sulfuric Acid Tank	Storage of VOC Compounds [LAC 33:III.2103.A]	DOES NOT APPLY. Tank does not store VOCs.
EQT921-EQ1932 3204 thru 3215	NSPS Subpart Kb – Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels for Which Construction, Reconstruction, or Modification Commenced after July 23, 1984. [40 CFR 60.110b]	DOES NOT APPLY as per 40 CFR 60.111b. Tanks do not meet the definition of storage vessel since they are process tanks.
UNOX Process Vessels 11-13; 21-23; 31-33; 41-43	Storage of VOC Compounds [LAC 33:III.2103.A]	DOES NOT APPLY. Vapor pressure of materials stored is less than 1.5 psia.

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Taft, St. Charles Parish, Louisiana

XI. Table 2. Explanation for Exemption Status or Non-Applicability of a Source

ID No:	Requirement	Notes
EQT933	NSPS Subpart III – Stationary Compression Ignition Internal Combustion Engines [40 CFR 60.4200(a)(2)]	DOES NOT APPLY. Engines have not been constructed, modified, or reconstructed after July 11, 2005.
3219-Diesel Pump 3	NESHAP Subpart ZZZZ – Stationary Reciprocating Internal Combustion Engines [40 CFR 63.6590(a)]	DOES NOT APPLY. Engines do not meet the definition of an affected source (> 500 HP).
	Emissions From Fuel Burning Equipment [LAC 33:III.1313.C]	DOES NOT APPLY. The primary purpose of this source does not match any of those listed at LAC 33:III.1313.B.
	Emission Standards for Sulfur Dioxide: Emissions Limitations, All Other Sources [LAC 33:III.1503.C]	DOES NOT APPLY as per LAC 33:III.1502.A.3. Source does not have the potential to emit over 5 TPY SO ₂ .
	Comprehensive Toxic Air Pollutant Emission Control Program [LAC 33:III.5109]	EXEMPT as per LAC 33:III.5105.B.3.a. Emissions are from the combustion of Group 1 virgin fossil fuels.

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XI. Table 2. Explanation for Exemption Status or Non-Applicability of a Source

ID No:	Requirement	Notes
EQT934 3220-Firewater Diesel Pump	NSPS Subpart III – Stationary Compression Ignition Internal Combustion Engines [40 CFR 60.4200(a)(2)] NESHAP Subpart ZZZZ – Stationary Reciprocating Internal Combustion Engines [40 CFR 63.6590]	DOES NOT APPLY. Engines have not been constructed, modified, or reconstructed after July 11, 2005.
EQT938 3224-Return Firewater Diesel Pump	Emissions From Fuel Burning Equipment [LAC 33:III.1313.C]	DOES NOT APPLY. As per 40 CFR 63.6590(b)(3), engines are existing stationary RICE and therefore do not have to meet the requirements of 40 CFR 63 Subpart ZZZZ or Subpart A. No initial notification is required.
	Emission Standards for Sulfur Dioxide: Emissions Limitations, All Other Sources [LAC 33:III.1503.C]	DOES NOT APPLY as per LAC 33:III.1502.A.3. Source is permitted to emit less than 5TPY SO ₂ .
	Comprehensive Toxic Air Pollutant Emission Control Program [LAC 33:III.5109]	EXEMPT as per LAC 33:III.5105.B.3.a. Emissions are from the combustion of Group 1 virgin fossil fuels.

LOUISIANA DEPARTMENT OF ENVIRONMENTAL QUALITY**Union Carbide Corp - St Charles Operations**

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Union Carbide Corp**Taft, St. Charles Parish, Louisiana****XI. Table 2. Explanation for Exemption Status or Non-Applicability of a Source**

ID No:	Requirement	Notes
EQT935, EQT937, EQT939 EIQs 3221	NSPS Subpart III – Stationary Compression Ignition Internal Combustion Engines [40 CFR 60.4200(a)(2)] NESHAP Subpart ZZZZ – Stationary Reciprocating Internal Combustion Engines [40 CFR 63.6590]	DOES NOT APPLY. Engines have not been constructed, modified, or reconstructed after July 11, 2005. DOES NOT APPLY. As per 40 CFR 63.6590(b)(3), engines are existing emergency stationary RICE and therefore do not have to meet the requirements of 40 CFR 63 Subpart ZZZZ or Subpart A. No initial notification is required.
3223, 3225	Emissions From Fuel Burning Equipment [LAC 33:III.1313.C]	DOES NOT APPLY. The primary purpose of these sources does not match any of those listed at LAC 33:III.1313.B.
	Emission Standards for Sulfur Dioxide: Emissions Limitations, All Other Sources [LAC 33:III.1503.C] Firewater Diesel Pumps	DOES NOT APPLY as per LAC 33:III.1502.A.3. Sources do not have the potential to emit over 5 TPY SO ₂ .
	Comprehensive Toxic Air Pollutant Emission Control Program [LAC 33:III.5109]	EXEMPT as per LAC 33:III.5105.B.3.a. Emissions are from the combustion of Group 1 virgin fossil fuels.

LOUISIANA DEPARTMENT OF ENVIRONMENTAL QUALITY**Union Carbide Corp - St Charles Operations****Agency Interest No.: 2083****Union Carbide Corp****Taft, St. Charles Parish, Louisiana****XI. Table 2. Explanation for Exemption Status or Non-Applicability of a Source**

ID No:	Requirement	Notes
EQT936	NESHAP Subpart ZZZZ - Stationary Reciprocating Internal Combustion Engines [40 CFR 63.6590(a)]	DOES NOT APPLY. Engines do not meet the definition of an affected source (> 500 HP).
3222-No. 3 Fire Water Diesel Pump	Emissions From Fuel Burning Equipment [LAC 33:III.1313.C]	DOES NOT APPLY. The primary purpose of this source does not match any of those listed at LAC 33:III.1313.B.
	Emission Standards for Sulfur Dioxide: Emissions Limitations, All Other Sources [LAC 33:III.1503.C]	DOES NOT APPLY as per LAC 33:III.1502.A.3. Sources do not have the potential to emit over 5 TPY SO ₂ .
	Comprehensive Toxic Air Pollutant Emission Control Program [LAC 33:III.5109]	EXEMPT as per LAC 33:III.5105.B.3.a. Emissions are from the combustion of Group 1 virgin fossil fuels.
EQT940	NSPS Subpart Kb - Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels for Which Construction, Reconstruction, or Modification Commenced after July 23, 1984. [40 CFR 60.110b]	DOES NOT APPLY. Tank capacity is less than 75 m ³ (< 19,813 gal). Additionally, the tank does not meet the definition of storage vessel since it is considered a process tank.
3226-Sump Tank	Storage of VOC Compounds [LAC 33:III.2105.A]	DOES NOT APPLY. Vapor pressure of materials stored is less than 1.5 psia.

LOUISIANA DEPARTMENT OF ENVIRONMENTAL QUALITY**Union Carbide Corp - St Charles Opérations**

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Union Carbide Corp**Taft, St. Charles Parish, Louisiana****XI. Table 2. Explanation for Exemption Status or Non-Applicability of a Source**

ID No:	Requirement	Notes
EQT942-946 EIQs 3228-3232	NSPS Subpart Kb – Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels for Which Construction, Reconstruction, or Modification Commenced after July 23, 1984. [40 CFR 60.110b]	DOES NOT APPLY. Tank capacity is less than 75 m ³ (< 19,813 gal). Additionally, the tank does not meet the definition of storage vessel since it is considered a process tank.
EQT950-955 EIQs 3236-3241	Storage of VOC Compounds [LAC 33:III.2103.A]	DOES NOT APPLY. This equipment does not place, store, or hold volatile organic compounds (VOCs). This equipment is used in the treatment of industrial wastewater as addressed in LAC 33:III.2153.
EQT948-949 EIQs 3234-3235	NSPS Subpart Kb – Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels for Which Construction, Reconstruction, or Modification Commenced after July 23, 1984. [40 CFR 60.110b]	DOES NOT APPLY. This equipment does not meet the definition of storage vessel since it is considered process tanks. Additionally, these are earthen basins not intended to be regulated under NSPS Subpart Kb as per EPA/450/3-81/003a (there were three types of vessels of concerns in developing & NSPS for VOL storage vessels; Fixed roof, and external & internal floating roof tanks.
EQT957 EIQ 3243	Storage of VOC Compounds [LAC 33:III.2103.A]	DOES NOT APPLY. This equipment does not place, store, or hold volatile organic compounds (VOCs). This equipment is used in the treatment of industrial wastewater as addressed in LAC 33:III.2153.
EQT959-961, EIQs 3245-3247		

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Taft, St. Charles Parish, Louisiana

The above table provides explanation for either the exemption status or non-applicability of a source cited by 1, 2 or 3 in the matrix presented in Section X (Table 1) of this permit.

INVENTORIES

AI ID: 2063 - Union Carbide Corp - St Charles Operations
 Activity Number: PER20070043
 Permit Number: 2104-V2
 Air - Title V Regular Permit Renewal

Subject Item Inventory:

ID	Description	Tank Volume	Max. Operating Rate	Normal Operating Rate	Contents	Operating Time
Wastewater Treatment Facility (WWTF)						
EQT 0033	199A - Residue Tank (ID-1513)	12740 gallons	6000 gallons/hr	1.62 MM gallons/yr	Hazardous Residue (BARC Tails, FDA Tails, EARX Purge, EAFC MK)	8760 hr/yr
EQT 0907	199B - Residue Tank (ID-1514)	29361 gallons	6000 gallons/hr	1.62 gallons/yr	hazardous residue (BARC Tails, EARX Purge, FDA Tails, EAFC MK)	8760 hr/yr
EQT 0908	199A - Carbon Cannister					8760 hr/yr
EQT 0909	199B - Carbon Cannister					8760 hr/yr
EQT 0910	199C - Residue Tank (ID-1515)	12740 gallons	6000 gallons/hr	5.37 MM gallons/yr	Residue (EHA, Undecane, BA Tails, SRC)	8760 hr/yr
EQT 0911	199D - Residue Tank (ID-1516)	29361 gallons	6000 gallons/hr	5.37 MM gallons/yr	Residue (EHA, Undecane, BA Tails, SRC)	8760 hr/yr
EQT 0912	199F - Residue Tank (ID-1517)	12740 gallons	6000 gallons/hr	5.37 MM gallons/yr	Residue (EHA, Undecane, BA Tails, SRC)	8760 hr/yr
EQT 0913	199G - Residue Tank (ID-1518)	29361 gallons	6000 gallons/hr	5.38 MM gallons/yr	hazardous residue (IPE, EHA, Undecane, BA Tails, SRC)	8760 hr/yr
EQT 0914	199G - Carbon Cannister					8760 hr/yr
EQT 0915	199J - Surge Sump Tank	4700 gallons				8760 hr/yr
EQT 0917	199K - Equalization Sump Tank	4700 gallons				8760 hr/yr
EQT 0918	199L - Wastewater Surge Tank	2.99 million gallons				8760 hr/yr
EQT 0919	199M - Wastewater Equalization Tank	2.99 million gallons				8760 hr/yr
EQT 0920	3201 - Sulfuric Acid Storage Tank	4495 gallons	5945 gallons/hr	500000 gallons/yr		8760 hr/yr
EQT 0921	3204 - Process Vessel 11	158000 gallons				8760 hr/yr
EQT 0922	3205 - Process Vessel 12	158000 gallons				8760 hr/yr
EQT 0923	3206 - Process Vessel 13	158000 gallons				8760 hr/yr
EQT 0924	3207 - Process Vessel 21	158000 gallons				8760 hr/yr
EQT 0925	3208 - Process Vessel 22	158000 gallons				8760 hr/yr
EQT 0926	3209 - Process Vessel 23	158000 gallons				8760 hr/yr
EQT 0927	3210 - Process Vessel 31	158000 gallons				8760 hr/yr
EQT 0928	3211 - Process Vessel 32	158000 gallons				8760 hr/yr
EQT 0929	3212 - Process Vessel 33	158000 gallons				8760 hr/yr
EQT 0930	3213 - Process Vessel 41	158000 gallons				8760 hr/yr
EQT 0931	3214 - Process Vessel 42	158000 gallons				8760 hr/yr
EQT 0932	3215 - Process Vessel 43	158000 gallons				8760 hr/yr
EQT 0933	3219 - Diesel Pump 3		234 horsepower			8760 hr/yr
EQT 0934	3220 - No. 1 Firewater Diesel Pump		800 horsepower			100 hr/yr
EQT 0935	3221 - No. 2 Firewater Diesel Pump		500 horsepower			100 hr/yr
EQT 0936	3222 - No. 3 Firewater Diesel Pump		335 horsepower			100 hr/yr
EQT 0937	3223 - No. 4 Firewater Diesel Pump		500 horsepower			100 hr/yr

INVENTORIES

AI ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

Subject Item Inventory:

ID	Description	Tank Volume	Max. Operating Rate	Normal Operating Rate	Contents	Operating Time
Wastewater Treatment Facility (WWTF)						
EOT 0938	3224 - Return Firewater Diesel Pump		700 horsepower	700 horsepower		100 hr/yr
EOT 0939	3225 - No. 6 Firewater Diesel Pump		500 horsepower	500 horsepower		100 hr/yr
EOT 0940	3226 - Sump Tank	15640 gallons				8760 hr/yr
EOT 0941	3227 - UNOX Vent Collection Header					8760 hr/yr
EOT 0942	3228 - North pH Adjustment WW Tank	19829 gallons				8760 hr/yr
EOT 0943	3229 - South pH Adjustment WW Tank	19823 gallons				8760 hr/yr
EOT 0944	3230 - East Primary Clarifier	113743 gallons				8760 hr/yr
EOT 0945	3231 - Center Primary Clarifier	113743 gallons				8760 hr/yr
EOT 0946	3232 - West Primary Clarifier	113743 gallons				8760 hr/yr
EOT 0947	3233 - Equalization and Surge Wastewater Tanks Header					8760 hr/yr
EOT 0948	3234 - North Air Stabilization Basin	16.35 million gallons				8760 hr/yr
EOT 0949	3235 - South Air Stabilization Basin	10.35 million gallons				8760 hr/yr
EOT 0950	3236 - North Flocculation Tank	33841 gallons				8760 hr/yr
EOT 0951	3237 - South Flocculation Tank	33841 gallons				8760 hr/yr
EOT 0952	3238 - Southeast Flocculation Tank	33841 gallons				8760 hr/yr
EOT 0953	3239 - North Secondary Clarifier	4145.2 gallons				8760 hr/yr
EOT 0954	3240 - South Secondary Clarifier	414552 gallons				8760 hr/yr
EOT 0955	3241 - Southeast Secondary Clarifier	560373 gallons				8760 hr/yr
EOT 0956	3242 - Storm Sump	9575 gallons				8760 hr/yr
EOT 0957	3243 - Digester	2.39 million gallons				8760 hr/yr
EOT 0958	3244 - Dewatering	6732 gallons				8760 hr/yr
EOT 0959	3245 - East Stormwater PPTB	3.59 million gallons				8760 hr/yr
EOT 0960	3246 - West Stormwater PPTB	3.56 million gallons				8760 hr/yr
EOT 0961	3247 - Settling Basin	3.14 million gallons				8760 hr/yr
EOT 0962	3248 - E-1 Olefins 1 Sump	10239 gallons				8760 hr/yr
EOT 0963	3249 - E-2 EA-1 Sump	1613 gallons				8760 hr/yr
EOT 0964	3250 - E-3A Oxide 1 Sump	15251 gallons				8760 hr/yr
EOT 0965	3251 - E-3B Oxide 2 Sump	20525 gallons				8760 hr/yr
EOT 0966	3252 - E-3C Oxide Tank Car Sump	7499 gallons				8760 hr/yr
EOT 0967	3253 - E-5 Site No. 1 Shipping Sump	8453 gallons				8760 hr/yr
EOT 0968	3254 - E-6 Barcol 1 Sump	30341 gallons				8760 hr/yr
EOT 0969	3255 - E-7 Acrylics Sump	33932 gallons				8760 hr/yr
EOT 0970	3256 - E-8 Butanol Sump	30341 gallons				8760 hr/yr
EOT 0971	3257 - E-11 Site No. 4 T/C Sump	4465 gallons				8760 hr/yr

INVENTORIES

AI ID: 2083 - Union Carbide Corp - St Charles Operations
 Activity Number: PER20070043
 Permit Number: 2104-V2
 Air - Title V/Regular Permit Renewal

Subject Item Inventory:

ID	Description	Tank Volume	Max. Operating Rate	Normal Operating Rate	Contents	Operating Time
Wastewater Treatment Facility (WWTF)						
EQT 0972	3258 - E-17 EA-2 Flare Sump	213 gallons				8760 hr/yr
EQT 0973	3259 - E-18 Site Logistics Sump A	32832 gallons				8760 hr/yr
EQT 0974	3260 - E-19 Site Logistics Sump B	21230 gallons				8760 hr/yr
EQT 0975	3262 - E-21 Olefins 2 Sump	12399 gallons				8760 hr/yr
EQT 0976	3263 - E-22 EA-2 Sump	7513 gallons				8760 hr/yr
EQT 0977	3264 - E-24A SPU WW Sump	32441 gallons				8760 hr/yr
EQT 0978	3266 - E-28A SE Corner of Latex Block Sump	166911 gallons				8760 hr/yr
EQT 0979	3267 - E-28B SW Corner of Latex Block Sump	213119 gallons				8760 hr/yr
EQT 0982	200 - Tank Truck Loading					8760 hr/yr
FUG 0020	196S - Fugitives					8760 hr/yr

Stack Information:

ID	Description	Velocity (ft/sec)	Flow Rate (cubic ft/min-actual)	Diameter (feet)	Discharge Area (square feet)	Height (feet)	Temperature (°F)
Wastewater Treatment Facility (WWTF)							
EQT 0033	199A - Residue Tank (ID-1513)			2		62	104
EQT 0907	199B - Residue Tank (ID-1514)			2		62	104
EQT 0910	199C - Residue Tank (ID-1515)			2		62	266
EQT 0911	199D - Residue Tank (ID-1516)			2		62	266
EQT 0912	199E - Residue Tank (ID-1517)			2		62	266
EQT 0913	199F - Residue Tank (ID-1518)			-2		62	266

Relationships:

ID	Description	Relationship	ID	Description
EQT 0033	199A - Residue Tank (ID-1513)	Controlled by	EQT 0988	199A - Carbon Canister
EQT 0907	199B - Residue Tank (ID-1514)	Controlled by	EQT 0989	199B - Carbon Cannister
EQT 0913	199G - Residue Tank (ID-1518)	Controlled by	EQT 0914	199G - Carbon Cannister
EQT 0915	199J - Surge Sump Tank	Vents to, (routed to)	EQT 0947	3223 - Equalization and Surge Wastewater Tanks Header
EQT 0917	199K - Equalization Sump Tank	Vents to, (routed to)	EQT 0947	3223 - Equalization and Surge Wastewater Tanks Header
EQT 0918	199L - Wastewater Surge Tank	Vents to, (routed to)	EQT 0947	3223 - Equalization and Surge Wastewater Tanks Header
EQT 0919	199M - Wastewater Equalization Tank	Vents to, (routed to)	EQT 0947	3223 - Equalization and Surge Wastewater Tanks Header
EQT 0921	3204 - Process Vessel 11	Vents to, (routed to)	EQT 0941	3227 - UNOX Vent Collection Header
EQT 0922	3205 - Process Vessel 12	Vents to, (routed to)	EQT 0941	3227 - UNOX Vent Collection Header
EQT 0923	3206 - Process Vessel 13	Vents to, (routed to)	EQT 0941	3227 - UNOX Vent Collection Header
EQT 0924	3207 - Process Vessel 21	Vents to, (routed to)	EQT 0941	3227 - UNOX Vent Collection Header
EQT 0925	3208 - Process Vessel 22	Vents to, (routed to)	EQT 0941	3227 - UNOX Vent Collection Header

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INVENTORIES

AI ID: 2083 - Union Carbide Corp - St Charles Operations
 Activity Number: PER20070043
 Permit Number: 2104-V2
 Air - Title V Regular Permit Renewal

Relationships:		Description	Relationship	ID	Description
EQT 0926	3209 - Process Vessel 23	Vents to (routed to)	EQT 0941	3227 - UNOX Vent Collection Header	
EQT 0927	3210 - Process Vessel 31	Vents to (routed to)	EQT 0941	3227 - UNOX Vent Collection Header	
EQT 0928	3211 - Process Vessel 32	Vents to (routed to)	EQT 0941	3227 - UNOX Vent Collection Header	
EQT 0929	3212 - Process Vessel 33	Vents to (routed to)	EQT 0941	3227 - UNOX Vent Collection Header	
EQT 0930	3213 - Process Vessel 41	Vents to (routed to)	EQT 0941	3227 - UNOX Vent Collection Header	
EQT 0931	3214 - Process Vessel 42	Vents to (routed to)	EQT 0941	3227 - UNOX Vent Collection Header	
EQT 0932	3215 - Process Vessel 43	Vents to (routed to)	EQT 0941	3227 - UNOX Vent Collection Header	
EQT 0940	3226 - Sump Tank	Vents to (routed to)	EQT 0941	3227 - UNOX Vent Collection Header	
EQT 0982	200 - Tank Truck Loading	Controlled by	GRP 0038	Loading - Vapor Balancing	

Subject Item Groups:

ID	Group Type	Group Description
GRP 0038	Equipment Group	Loading - Vapor Balancing
GRP 0153	Equipment Group	WWTF: CAF - Wastewater Treatment Facility Cap
UNF 0009	Unit or Facility Wide	EnvOps - Wastewater Treatment Facility (WWTF)

Group Membership:

ID	Description	Member of Groups
EQT 0915	199J - Surge Sump Tank	GRP00000001153
EQT 0917	199K - Equalization Sump Tank	GRP00000001153
SOT 0918	199L - Wastewater Surge Tank	GRP00000001153
EQT 0919	199M - Wastewater Equalization Tank	GRP00000001153
EQT 0921	3203 - Process Vessel 11	GRP00000001153
EQT 0922	3205 - Process Vessel 12	GRP00000001153
EQT 0923	3206 - Process Vessel 13	GRP00000001153
EQT 0924	3207 - Process Vessel 21	GRP00000001153
SOT 0925	3208 - Process Vessel 22	GRP00000001153
EQT 0926	3209 - Process Vessel 23	GRP00000001153
EQT 0927	3210 - Process Vessel 31	GRP00000001153
EQT 0928	3211 - Process Vessel 32	GRP00000001153
EQT 0929	3212 - Process Vessel 33	GRP00000001153
SOT 0930	3213 - Process Vessel 41	GRP00000001153
EQT 0931	3214 - Process Vessel 42	GRP00000001153
EQT 0932	3215 - Process Vessel 43	GRP00000001153
EQT 0940	3226 - Sump Tank	GRP00000001153
EQT 0941	3227 - UNOX Vent Collection Header	GRP00000001153
EQT 0942	3228 - North pH Adjustment WW Tank	GRP00000001153
EQT 0943	3229 - South pH Adjustment WW Tank	GRP00000001153

INVENTORIES

AI ID: 2083 - Union Carbide Corp. - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

Group Membership:

ID	Description	Member of Groups
EQT 0944	3230 - East Primary Clarifier.	GRP0000000153
EQT 0945	3231 - Center Primary Clarifier.	GRP0000000153
EQT 0946	3232 - West Primary Clarifier.	GRP0000000153
EQT 0947	3233 - Equalization and Surge Wastewater Tanks Header	GRP0000000153
EQT 0948	3234 - North Air Stabilization Basin	GRP0000000153
EQT 0949	3235 - South Air Stabilization Basin	GRP0000000153
EQT 0950	3236 - North Flocculation Tank	GRP0000000153
EQT 0951	3237 - South Flocculation Tank	GRP0000000153
EQT 0952	3238 - Southeast Flocculation Tank	GRP0000000153
EQT 0953	3239 - North Secondary Clarifier	GRP0000000153
EQT 0954	3240 - South Secondary Clarifier	GRP0000000153
EQT 0955	3241 - Southeast Secondary Clarifier	GRP0000000153
EQT 0956	3242 - Storm Sump	GRP0000000153
EQT 0957	3243 - Digester	GRP0000000153
EQT 0958	3244 - Dewatering	GRP0000000153
EQT 0959	3245 - East Stormwater PPTB	GRP0000000153
EQT 0960	3246 - West Stormwater PPTB	GRP0000000153
EQT 0961	3247 - Settling Basin	GRP0000000153
EQT 0962	3248 - E-1 Olefins 1 Sump	GRP0000000153
EQT 0963	3249 - E-2 EA-1Sump	GRP0000000153
EQT 0964	3250 - E-3A Oxide 1 Sump	GRP0000000153
EQT 0965	3251 - E-3B Oxide 2 Sump	GRP0000000153
EQT 0966	3252 - E-3C Oxide Tank Car Sump	GRP0000000153
EQT 0967	3253 - E-5 Site No. 1 Shipping Sump	GRP0000000153
EQT 0968	3254 - E-6 Butanol 1 Sump	GRP0000000153
EQT 0969	3255 - E-7 Acrylics Sump	GRP0000000153
EQT 0970	3256 - E-8 Butanol 1 Sump	GRP0000000153
EQT 0971	3257 - E-11 Site No. 4 T/C Sump	GRP0000000153
EQT 0972	3258 - E-17 EA-2 Flare Sump	GRP0000000153
EQT 0973	3259 - E-18 Site Logistics Sump A	GRP0000000153
EQT 0974	3260 - E-19 Site Logistics Sump B	GRP0000000153
EQT 0975	3262 - E-21 Olefins 2 Sump	GRP0000000153
EQT 0976	3263 - E-22 EA-2 Sump	GRP0000000153
EQT 0977	3264 - E-24A SPUWW Sump	GRP0000000153
EQT 0982	200 - Tank Truck Loading	GRP000000038

NOTE: The UNF group relationship is not printed in this table. Every subject item is a member of the UNF group

Annual Maintenance Fee:

Fee Number	Air Contaminant Source	Multplier	Units Of Measure
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INVENTORIES

AI ID: 2083 - Union Carbide Corp - St Charles Operations
 Activity Number: PER20070043
 Permit Number: 2104-V2
 Air - Title V Regular Permit Renewal

Fee Number	Air Contaminant Source	Multiplier	Units Of Measure
1710	1710 Negotiated Fee	6200	\$ New App

SIC Codes:

EMISSION RATES FOR CRITERIA POLLUTANTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

Note: Emission rates in bold are from alternate scenarios and are not included in permitted totals unless otherwise noted in a footnote.

Emission rates Notes:

Noncompliance with this limitation is a reportable violation of the permit. - Notify the Office of Environmental Compliance, Enforcement Division if wastewater flow rate exceeds the maximum listed in this specific condition for any twelve consecutive month period. Which Months: All Year

EMISSION RATES FOR TAP/HAP & OTHER POLLUTANTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

Emission Pt.	Pollutant	Avg lb/hr	Tons/Year
EQT 0033 199A	Acetophenone	<0.001	<0.01
	Acrylic acid	0.002	0.01
	Ethyl Acrylate	0.004	0.02
	Hydroquinone	<0.001	<0.01
	Methanol	<0.001	<0.01
	Phenol	<0.001	<0.01
	Phthalic Anhydride	<0.001	<0.01
	Sulfuric acid	<0.001	<0.01
	n-butyl alcohol	<0.001	<0.01
EQT 0907 199B	Acetophenone	<0.001	<0.01
	Acrylic acid	0.003	0.01
	Ethyl Acrylate	0.005	0.02
	Hydroquinone	<0.001	<0.01
	Methanol	<0.001	<0.01
	Phenol	<0.001	<0.01
	Phthalic Anhydride	<0.001	<0.01
	Sulfuric acid	<0.001	<0.01
	n-butyl alcohol	<0.001	<0.01
EQT 0910 199C	Acrylic acid	0.005	0.02
	Dibutyl phthalate	<0.001	<0.01
	Ethyl Acrylate	0.01	0.06
	Hydroquinone	<0.001	<0.01
	Naphthalene	0.003	0.01
	bis(2-ethylhexyl)phthalate	<0.001	<0.01
EQT 0911 199D	Acrylic acid	0.01	0.03
	Dibutyl phthalate	<0.001	<0.01
	Ethyl Acrylate	0.02	0.08
	Hydroquinone	<0.001	<0.01
	Naphthalene	0.004	0.02
	bis(2-ethylhexyl)phthalate	<0.001	<0.01
EQT 0912 199F	Acrylic acid	0.005	0.02
	Dibutyl phthalate	<0.001	<0.01
	Ethyl Acrylate	0.01	0.06

EMISSION RATES FOR TAP/HAP & OTHER POLLUTANTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

Emission Pt.	Pollutant	Avg lb/hr	Tons/Year
EQT 0912 199F	Hydroquinone	<0.001	<0.01
	Naphthalene	0.003	0.01
	bis(2-ethylhexyl)phthalate	<0.001	<0.01
EQT 0913 199G	Acrylic acid	<0.001	<0.01
	Dibutyl phthalate	<0.001	<0.01
	Ethyl Acrylate	0.001	<0.01
	Hydroquinone	<0.001	<0.01
	Naphthalene	<0.001	<0.01
	bis(2-ethylhexyl)phthalate	<0.001	<0.01
EQT 0920 3201	Sulfuric acid	<0.001	<0.01
EQT 0978 3266	Acetaldehyde	0.01	0.03
	Ammonia	0.01	0.04
	Formaldehyde	0.002	0.01
	Methyl chloride	0.001	0.01
	Vinyl acetate	0.002	0.01
EQT 0979 3267	Acetaldehyde	0.002	0.01
	Ammonia	0.01	0.03
	Formaldehyde	0.001	<0.01
FUG 0020 1965	Acetophenone	<0.001	<0.01
	Acrylic acid	0.05	0.22
	Dibutyl phthalate	<0.001	<0.01
	Ethyl Acrylate	0.04	0.18
	Hydroquinone	0.01	0.02
	Methanol	<0.001	<0.01
	Naphthalene	0.001	0.02
	Phenol	0.002	0.01
	Phthalic Anhydride	0.001	<0.01
	Sulfuric acid	0.03	0.15
	bis(2-ethylhexyl)phthalate	<0.001	<0.01
GRP 0153 WWTF-CAP	n-butyl alcohol	0.005	0.02
	1,2-Dichloroethane	0.09	0.41
	1,3-Butadiene	<0.001	<0.01
	1,4-Dioxane	0.16	0.71

EMISSION RATES FOR TAP/HAP & OTHER POLLUTANTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

Emission Pt.	Pollutant	Avg lb/hr	Tons/Year
GRP 0153 WWTF-CAP	Acetaldehyde	8.74	38.27
	Acetonitrile	0.001	<0.01
	Acrolein	0.01	0.03
	Acrylic acid	0.003	0.01
	Ammonia	6.24	27.31
	Benzene	0.21	0.94
	Biphenyl	0.01	0.03
	Carbon tetrachloride	0.01	0.04
	Chloroform	0.01	0.04
	Cresol	<0.001	<0.01
	Ethyl benzene	0.002	0.01
	Ethylene glycol	0.19	0.84
	Ethylene oxide	1.09	4.79
	Formaldehyde	0.11	0.49
	Glycol ethers (Table 51.1)	<0.001	<0.01
	Hydroquinone	<0.001	<0.01
	Methanol	1.18	5.15
	Methyl chloride	<0.001	<0.01
	Methyl ethyl ketone	0.002	0.01
	Naphthalene	0.03	0.40
	Phenol	<0.001	<0.01
	Polynuclear Aromatic Hydrocarbons	0.002	0.01
	Propionaldehyde	1.17	5.14
	Pyridine	<0.001	<0.01
	Styrene	0.01	0.06
	Tetrachloroethylene	0.06	0.26
	Toluene	0.08	0.38
	Vinyl acetate	2.29	10.04
	Vinyl chloride	0.04	0.17
	Xylene (mixed isomers)	0.01	0.03
	bis(2-ethylhexyl)phthalate	<0.001	<0.01
	n-Hexane	<0.001	<0.01
	n-butyl alcohol	13.97	61.18

EMISSION RATES FOR TAP/HAP & OTHER POLLUTANTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal.

Note: Emission rates in bold are from alternate scenarios and are not included in permitted totals unless otherwise noted in a footnote. Emission rates attributed to the UNF reflect the sum of the TAP/HAP limits of the individual emission points (or caps) under this permit, but do not constitute an emission cap.

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

AI 2083 - Taft/Star Facility

1 [40 CFR 60]

2 [40 CFR 61.145(b)(1)]

3 [40 CFR 61.148]

4 [40 CFR 61.342(b)]

5 [40 CFR 61.342(c)(1)(i)]

6 [40 CFR 61.355]

7 [40 CFR 61.356]

8 [40 CFR 61.357(d)(2)]

9 [40 CFR 61.357(d)(6)]

10 [40 CFR 61.357(d)(7)]

11 [40 CFR 61.357(d)(8)]

12 [40 CFR 61.]

13 [40 CFR 63.1080-1097]

14 [40 CFR 63.1100-1114]

All affected facilities shall comply with all applicable provisions in 40 CFR 66 Subpart A.

Provide DEQ with written notice of intention to demolish or renovate prior to performing activities to which 40 CFR 61 Subpart M applies. Delivery of the notice by U.S. Postal Service, commercial delivery service, or hand delivery is acceptable. Subpart M. [40 CFR 61.145(b)(1)]

Do not install or reinstall on a facility component any insulating materials that contain commercial asbestos if the materials are either molded and friable or wet-applied and friable after drying. Subpart M.

Comply with the requirements of 40 CFR 61.342(c) through (h) no later than 90 days following the effective date, unless a waiver of compliance has been obtained under 40 CFR 61.11, or by the initial startup for a new source with an initial startup after the effective date. Subpart FF. [40 CFR 61.342(b)]

Waste streams containing benzene: Remove or destroy the benzene contained in the waste using a treatment process or wastewater treatment system that complies with the standards specified in 40 CFR 61.348. Subpart FF. [40 CFR 61.342(c)(1)(i)]

Determine compliance with 40 CFR 61 Subpart FF using the test methods and procedures specified in 40 CFR 61.355(a) through (i), as applicable. Subpart FF.

Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Maintain records as specified in 40 CFR 61.356(a) through (n), as applicable. Maintain each record in a readily accessible location at the facility site for a period not less than two years from the date the information is recorded unless otherwise specified. Subpart FF.

Submit report: Due annually, beginning on the date that equipment necessary to comply with 40 CFR 61 Subpart FF has been certified in accordance with 40 CFR 61.357(d)(1). Submit updates to the information listed in 40 CFR 61.357(a)(1) through (a)(3) or, if the information in 40 CFR 61.357(a)(1) through (3) is not changed in the following year, a statement to that effect. Subpart FF. [40 CFR 61.357(d)(2)]

Submit report: Due quarterly, beginning three months after the date that the equipment necessary to comply with 40 CFR 61 Subpart FF has been certified in accordance with 40 CFR 61.357(d)(1). Submit a certification that all of the required inspections have been carried out in accordance with the requirements of 40 CFR 61 Subpart FF. Subpart FF. [40 CFR 61.357(d)(6)]

Submit report: Due quarterly, beginning three months after the date that the equipment necessary to comply with 40 CFR 61 Subpart FF has been certified in accordance with 40 CFR 61.357(d)(7)(i) through (d)(7)(v). Subpart FF. [40 CFR 61.357(d)(7)]

Submit report: Due annually, beginning one year after the date that the equipment necessary to comply with 40 CFR 61 Subpart FF has been certified in accordance with 40 CFR 61.357(d)(1). Submit a report that summarizes all inspections required by 40 CFR 61.342 through 61.354 during which detectable emissions are measured or a problem that could result in benzene emissions is identified, including information about the repairs or corrective action taken. Subpart FF. [40 CFR 61.357(j)(8)]

All affected facilities shall comply with all applicable provisions in 40 CFR 61 Subpart A.

Each ethylene production unit shall comply with NESHAP Subpart FF for benzene waste streams. Subpart XX

Applicable to Hydrocarbons Unit.

Each ethylene production unit shall comply with the wastewater requirements of NESHAP Subpart XX for ethylene manufacturing process unit waste stream. Subpart YY

Applicable to Hydrocarbons Unit.

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations
Activity Number: PER20070043
Permit Number: 2104-V2
Air - Title V Regular Permit Renewal

AI 2083 - Taft/Star Facility

15 [40 CFR 63.1420-1439]

Each applicable unit shall comply with NESHAP Subpart G for Group 2 process wastewater streams. Units shall comply with recordkeeping and reporting requirements of this subpart. Subpart PPP.

- 16 [40 CFR 63.7881(a)]
- 17 [40 CFR 63.7881(a)]
- 18 [40 CFR 63.]
- 19 [40 CFR 68.15(a)]
- 20 [40 CFR 68.15(b)]
- 21 [40 CFR 68.15(c)]
- 22 [40 CFR 68.15(c)]
- 23 [40 CFR 68.155]
- 24 [40 CFR 68.160]
- 25 [40 CFR 68.165]
- 26 [40 CFR 68.168]
- 27 [40 CFR 68.175]
- 28 [40 CFR 68.180]
- 29 [40 CFR 68.185(b)]
- 30 [40 CFR 68.190(c)]
- 31 [40 CFR 68.190]
- 32 [40 CFR 68.200]
- 33 [40 CFR 68.22]
- 34 [40 CFR 68.25]
- 35 [40 CFR 68.28]

- Applicable to Unit 8.
- When permittee conducts a site remediation, as defined in 40 CFR 63.7957, permittee shall comply with all applicable requirements of this subpart unless the site remediation is exempted under 40 CFR 63.7881 (b) or (c). Subpart GGGGG. [40 CFR 63.7881(a)]
- When permittee conducts a site remediation, as defined in 40 CFR 63.7957, permittee shall comply with all applicable requirements of this subpart unless the site remediation is exempted under 40 CFR 63.7881 (b) or (c). Subpart GGGGG. [40 CFR 63.7881(a)]
- All affected facilities shall comply with all applicable provisions in 40 CFR 63 Subpart A.
- Develop a management system to oversee the implementation of the risk management program elements. [40 CFR 68.15(a)]
- Assign a qualified person or position that has the overall responsibility for the development, implementation, and integration of the risk management program elements. [40 CFR 68.15(b)]
- Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Document the names or positions of the people, other than the person identified under 68.15(b), who are assigned responsibility for implementing individual requirements of 40 CFR 68. [40 CFR 68.15(c)]
- Define the lines of authority through an organization chart or similar document when responsibility for implementing individual requirements of 40 CFR 68 is assigned to persons other than the person identified under 68.15(b). [40 CFR 68.15(c)]
- Provide in the RMP an executive summary that includes a brief description of the elements listed in 68.155(a) through (g).
- Complete a single registration form and include in the RMP. Cover all regulated substances handled in covered processes. Include in the registration the information specified in 68.160(b)(1) through (13).
- Submit in the RMP information the release scenarios specified in 68.165(a)(2). Include the data listed in 68.165(b)(1) through (13).
- Submit in the RMP the information provided in 68.42(b) on each accident covered by 68.42(a).
- Provide in the RMP the information indicated in 68.175(b) through (p).
- Provide in the RMP the emergency response information listed in 68.180(e) through (c).
- Submit in the RMP a single certification that, to the best of the signer's knowledge, information, and belief formed after reasonable inquiry, the information submitted is true, accurate, and complete. [40 CFR 68.185(b)]
- Submit revised registration to EPA: Due within six months after a stationary source is no longer subject to 40 CFR 68. Indicate that the stationary source is no longer covered. [40 CFR 68.190(c)]
- Review and update the RMP as specified in 68.190(b) and submit it in a method and format to a central point specified by EPA prior to June 21, 1999.
- Maintain records supporting the implementation of 40 CFR 68 for five years unless otherwise provided.
- Use the endpoints specified in 68.22(a) through (g) for analyses of offsite consequences.
- Analyze the release scenarios in 68.25, as specified in 68.25(a) through (f).
- Identify and analyze at least one alternative release scenario for each regulated toxic substance held in a covered process(es) and at least one alternative release scenario to represent all flammable substances held in covered processes, as specified in 68.28(b) through (e).

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070643

Permit Number: 2104-Y2

Air - Title V Regular Permit Renewal

AI 2083 - Taft/Star Facility

- 36 [40 CFR 68.30] Estimate in the RMP the population within a circle with its center at the point of the release and a radius determined by the distance to the endpoint defined in 68.22(a).
- 37 [40 CFR 68.33] List in the RMP environmental receptors within a circle with its center at the point of the release and a radius determined by the distance to the endpoint defined in 68.22(a).
- 38 [40 CFR 68.36(b)] Submit revised RMP. Due within six months after changes in processes, quantities stored or handled, or any other aspect of the stationary source increase or decrease the distance to the endpoint by a factor of two or more. [40 CFR 68.36(b)]
- 39 [40 CFR 68.36] Review and update the offsite consequence analyses at least once every five years. Complete a revised analysis within six months if changes in processes, quantities stored or handled, or any other aspect of the stationary source might reasonably be expected to increase or decrease the distance to the endpoint by a factor of two or more.
- 40 [40 CFR 68.39] Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Maintain the records specified in 68.39(a) through (e) on the offsite consequence analyses.
- 41 [40 CFR 68.42] Include in the five-year accident history all accidental releases from covered processes that resulted in deaths, injuries, or significant property damage on site, or known offsite deaths, injuries, evacuations, sheltering in place, property damage, or environmental damage. Include the information specified in 68.42(b); 1) through (10) for each accidental release.
- 42 [40 CFR 68.65(a)] Compile written process safety information, which includes information pertaining to the hazards of the regulated substances used or produced by the process, information pertaining to the technology of the process, and information pertaining to the equipment in the process, before conducting any process hazard analysis required by [40 CFR 68.65(a)]
- 43 [40 CFR 68.65(d)(2)] Equipment/operational data recordkeeping by electronic or hard copy continuously. Document that equipment complies with recognized and generally accepted good engineering practices. [40 CFR 68.65(d)(2)]
- 44 [40 CFR 68.65(d)(3)] Equipment/operational data recordkeeping by electronic or hard copy continuously. Document that existing equipment, designed and constructed in accordance with codes, standards, or practices that are no longer in general use, is designed, maintained, inspected, tested, and operating in a safe manner. [40 CFR 68.65(d)(3)]
- 45 [40 CFR 68.65(d)(3)] Determine that existing equipment, designed and constructed in accordance with codes, standards, or practices that are no longer in general use, is designed, maintained, inspected, tested, and operating in a safe manner. [40 CFR 68.65(d)(3)]
- 46 [40 CFR 68.67(a)] Equipment/operational data recordkeeping at the regulation's specified frequency. Document the priority order for conducting process hazard analyses based on a rationale which includes such considerations as extent of the process hazards, number of potentially affected employees, age of the process, and operating history of the process. [40 CFR 68.67(a)]
- 47 [40 CFR 68.67(a)] Determine the priority order for conducting process hazard analyses based on a rationale which includes such considerations as extent of the process hazards, number of potentially affected employees, age of the process, and operating history of the process. [40 CFR 68.67(a)]
- 48 [40 CFR 68.67(b)] Use one or more of the methodologies in Sec. 68.67(b)(1) through (b)(7) to determine and evaluate the hazards of the process being analyzed. [40 CFR 68.67(b)]
- 49 [40 CFR 68.67(d)] Use a team with expertise in engineering and process operations to perform the process hazard analysis. Include at least one employee who has experience and knowledge specific to the process being evaluated, and at least one employee who is knowledgeable in the specific process hazard analysis methodology being used. [40 CFR 68.67(d)]

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal**AI 2083 - Taft/Star Facility**

- 50 [40 CFR 68.67(e)] Establish a system to promptly address the team's findings and recommendations; assure that the recommendations are resolved in a timely manner and that the resolution is documented; document what actions are to be taken; complete actions as soon as possible; develop a written schedule of when these actions are to be completed; communicate the actions to operating, maintenance and other employees whose work assignments are in the process and who may be affected by the recommendations or actions. [40 CFR 68.67(e)]
- 51 [40 CFR 68.67(e)] Equipment/operational data recordkeeping by electronic or hard copy continuously. Document the resolution of the recommendations of the team performing the process hazard analysis, and what actions are to be taken. [40 CFR 68.67(e)]
- 52 [40 CFR 68.67(f)] Update and revalidate the process hazard analysis at least every five years after the completion of the initial process hazard analysis, to assure that the process hazard analysis is consistent with the current process. Use a team that meets the requirements in Sec. 68.67(d). [40 CFR 68.67(f)]
- 53 [40 CFR 68.67(g)] Retain process hazards analyses and updates or validations for each process covered by this section, as well as the documented resolution of recommendations described in Sec. 68.67(e), for the life of the process. [40 CFR 68.67(g)]
- 54 [40 CFR 68.69(a)] Develop and implement written operating procedures that provide clear instructions for safely conducting activities involved in each covered process consistent with the process safety information. Address steps for each operating phase, operating limits, safety and health considerations, and safety systems and their functions in the procedures. [40 CFR 68.69(a)]
- 55 [40 CFR 68.69(b)] Make operating procedures readily accessible to employees who work in or maintain a process. [40 CFR 68.69(b)]
- 56 [40 CFR 68.69(c)] Review operating procedures as often as necessary to assure that they reflect current operating practice, including changes that result from changes in process chemicals, technology, and equipment, and changes to stationary sources. Certify annually that these operating procedures are current and accurate. [40 CFR 68.69(c)]
- 57 [40 CFR 68.69(d)] Develop and implement safe work practices to provide for the control of hazards during specific operations. [40 CFR 68.69(d)]
- 58 [40 CFR 68.71(a)(1)] Train each employee presently involved in operating a process, and each employee before being involved in operating a newly assigned process, in an overview of the process and in the operating procedures as specified in Sec. 68.69. Emphasize the specific safety and health hazards, emergency operations including shutdown, and safe work practices applicable to the employee's job tasks. [40 CFR 68.71(a)(1)]
- 59 [40 CFR 68.71(b)] Provide refresher training at least every three years, and more often if necessary, to each employee involved in operating a process to assure that the employee understands and adheres to the current operating procedures of the process. [40 CFR 68.71(b)]
- 60 [40 CFR 68.71(c)] Ascertain that each employee involved in operating a process has received and understood the training required by Sec. 68.71. [40 CFR 68.71(c)]
- 61 [40 CFR 68.71(c)] Equipment/operational data recordkeeping by electronic or hard copy at the regulations specified frequency. Prepare a record which contains the identity of the employee, the date of training required by 40 CFR 68.71, and the means used to verify that the employee understood the training. [40 CFR 68.71(c)]
- 62 [40 CFR 68.73(b)] Establish and implement written procedures to maintain the ongoing integrity of process equipment listed in Sec. 68.73(a). [40 CFR 68.73(b)]
- 63 [40 CFR 68.73(c)] Train each employee involved in maintaining the ongoing integrity of process equipment in an overview of that process and its hazards and in the procedures applicable to the employee's job tasks to assure that the employee can perform the job tasks in a safe manner. [40 CFR 68.73(c)]
- 64 [40 CFR 68.73(d)(4)] Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Document each inspection and test that has been performed on process equipment. Maintain records of the information specified in Sec. 68.73(d)(4). [40 CFR 68.73(d)(4)]
- 65 [40 CFR 68.73(e)] Correct deficiencies in equipment that are outside acceptable limits before further use or in a safe and timely manner when necessary means are taken to assure safe operation. [40 CFR 68.73(e)]

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

AI 2083 - Taft/Star Facility

Assure that equipment as it is fabricated is suitable for the process application for which it will be used, in the construction of new plants and equipment. Perform appropriate checks and inspections to assure that equipment is installed properly and consistent with design specifications and the manufacturer's instructions. Assure that maintenance materials, spare parts and equipment are suitable for the process application for which they will be used. [40 CFR 68.73(h)]

Inform employees involved in operating a process, and maintenance and contract employees whose job tasks will be affected, of a change in the process and train them in the change, prior to start-up of the process or affected part of the process. [40 CFR 68.75(c)]
Update the process safety information required by Sec. 68.65 if a change covered by 68.75 results in a change in the process safety information. [40 CFR 68.75(d)]

Update the operating procedures or practices required by Sec. 68.69 if a change covered by 68.75 results in a change in the operating procedures or practices. [40 CFR 68.75(e)]
Establish and implement written procedures to manage changes to process chemicals, technology, equipment, and procedures, and, changes to stationary sources that affect a covered process. Assure that the considerations specified in Sec. 68.75(b)(1) through (b)(5) are addressed prior to any change.

Perform a pre-startup safety review for new stationary sources and for modified stationary sources when the modification is significant enough to require a change in the process safety information. Safety review must confirm the information specified in Sec. 68.77(b)(1) through (b)(4) prior to the introduction of regulated substances to a process.
Develop a report of the findings of the compliance audit required by 40 CFR 68.79(a) [40 CFR 68.79(c)]

Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Document the appropriate response to each of the findings of the compliance audit, and document that deficiencies have been corrected. [40 CFR 68.79(d)]
Determine an appropriate response to each of the findings of the compliance audit. [40 CFR 68.79(d)]

Retain the two (2) most recent compliance audit reports. [40 CFR 68.79(e)]

Conduct compliance audit: Due at least every three years. Certify compliance with the provisions of the prevention program to verify that procedures and practices developed under 40 CFR 68 are adequate and are being followed. Conduct compliance audit by at least one person knowledgeable in the process.

Establish an incident investigation team consisting of at least one person knowledgeable in the process involved, including a contract employee if the incident involved work of the contractor, and other persons with appropriate knowledge and experience to thoroughly investigate and analyze the incident. [40 CFR 68.81(c)]
Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Document resolutions and corrective actions of the incident report findings and recommendations. [40 CFR 68.81(e)]

Establish a system to promptly address and resolve the incident report findings and recommendations. [40 CFR 68.81(e)]
Conduct incident investigation: Due as promptly as possible, but not later than 48 hours following each incident which resulted in, or could reasonably have resulted in a catastrophic release of a regulated substance.

Prepare a report at the conclusion of the incident investigation which includes, at a minimum, the information specified in 40 CFR 68.81(d)(1) through (5). Review the report with all affected personnel whose job tasks are relevant to the incident findings including contract employees where applicable. Retain the incident investigation reports for five years.

Develop a written plan of action regarding the implementation of the employee participation required by 40 CFR 68. [40 CFR 68.83(a)]

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations
Activity Number: PER20070043
Permit Number: 2104-V2
Air - Title V Regular Permit Renewal

AI 2083 - Taft/Star Facility

- 83 [40 CFR 68.83(b)] Consult with employees and their representatives on the conduct and development of process hazards analyses and on the development of the other elements of process safety management. [40 CFR 68.83(b)]
- 84 [40 CFR 68.83(c)] Provide to employees and their representatives access to process hazard analyses and to all other information required to be developed under 40 CFR 68. [40 CFR 68.83(c)]
- 85 [40 CFR 68.85] Issue a hot work permit for hot work operations conducted on or near a covered process. Document in the permit that the fire prevention and protection requirements in 29 CFR 1910.252(a) have been implemented prior to beginning the hot work operations; indicate the date(s) authorized for hot work, and identify the object on which hot work is to be performed. Keep permit on file until completion of the hot work operations.
- 86 [40 CFR 68.87(b)(1)] Obtain and evaluate information regarding the contract owner or operator's safety performance and programs, when selecting a contractor. [40 CFR 68.87(b)(1)]
- 87 [40 CFR 68.87(b)(2)] Inform contract owner or operator of the known potential fire, explosion, or toxic release hazards related to the contractor's work and the process. [40 CFR 68.87(b)(2)]
- 88 [40 CFR 68.87(b)(3)] Explain to the contract owner or operator the applicable provisions of 40 CFR 68 Subpart E. [40 CFR 68.87(b)(3)]
- 89 [40 CFR 68.87(b)(4)] Develop and implement safe work practices consistent with Sec. 68.69(d), to control the entrance, presence, and exit of the contract owner or operator and contract employees in covered process areas. [40 CFR 68.87(b)(4)]
- 90 [40 CFR 68.87(b)(5)] Periodically evaluate the performance of the contract owner or operator in fulfilling their obligations as specified in 40 CFR 68.87(c). [40 CFR 68.87(b)(5)]
- 91 [40 CFR 68.95(a)] Develop and implement an emergency response program for the purpose of protecting public health and the environment. Include in the program the elements listed in 40 CFR 68.95(a)(1) through (4). [40 CFR 68.95(a)]
- 92 [40 CFR 68.95(c)] Coordinate the emergency response plan developed under 68.95(a)(1) with the community emergency response plan developed under 42 U.S.C. 11003. Upon request of the local emergency planning committee or emergency response officials, promptly provide information necessary for developing and implementing the community emergency response plan. [40 CFR 68.95(c)]
- 93 [40 CFR 82 Subpart F] Comply with the standards for recycling and emissions reduction pursuant to 40 CFR Part 82, Subpart F, except as provided for Motor Vehicle Air Conditioners (MVACs) in Subpart B.
- 94 [LAC 33:III.1103] Emissions of smoke which pass onto or across a public road and create a traffic hazard by impairment of visibility as defined in LAC 33:III.111 or intensify an existing traffic hazard condition are prohibited.
- 95 [LAC 33:III.1109.B] Outdoor burning of waste material or other combustible material is prohibited.
- 96 [LAC 33:III.1303.B] Emissions of particulate matter which pass onto or across a public road and create a traffic hazard by impairment of visibility or intensify an existing traffic hazard condition are prohibited.
- 97 [LAC 33:III.1305] Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.]
- 98 [LAC 33:III.2113.A] Maintain best practical housekeeping and maintenance practices at the highest possible standards to reduce the quantity of organic compounds emissions. Good housekeeping shall include, but not be limited to, the practices listed in LAC 33:III.2113.A.1-5.
- 99 [LAC 33:III.219] Failure to pay the prescribed application fee or annual fee as provided herein, within 90 days after the due date, will constitute a violation of these regulations and shall subject the person to applicable enforcement actions under the Louisiana Environmental Quality Act including, but not limited to, revocation or suspension of the applicable permit, license, registration, or variance.

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations
 Activity Number: PER20070043
 Permit Number: 2104-Y2
 Air - Title V Regular Permit Renewal

AI 2083 - Tatu/Star Facility

- Discharges of odorous substances at or beyond property lines which cause a perceived odor intensity of six or greater on the specified eight point butanol scale as determined by Method 41 of LAC 33:III.2901.G are prohibited.
- If requested to monitor for odor intensity, take and transport samples in a manner which minimizes alteration of the samples either by contamination or loss of material. Evaluate all samples as soon after collection as possible in accordance with the procedures set forth in LAC 33:III.2901.G.
- Do not construct or modify any stationary source subject to any standard set forth in LAC 33:III.Chapter 51.Subchapter A without first obtaining written authorization from DEQ in accordance with LAC 33:III.Chapter 51.Subchapter A, after the effective date of the standard.
- Do not cause a violation of any ambient air standard listed in LAC 33:III.Table 51.2, unless operating in accordance with LAC 33:III.5109.B.
- Do not build, erect, install, or use any article, machine, equipment, process, or method, the use of which conceals an emission that would otherwise constitute a violation of an applicable standard.
- Do not fail to keep records, notify, report or revise reports as required under LAC 33:III.Chapter 51.Subchapter A.
- Include a certification statement with the annual emission report and revisions to any emission report that attests that the information contained in the emission report is true, accurate, and complete, and that is signed by a responsible official, as defined in LAC 33:III.502. Include the full name of the responsible official, title, signature, date of signature and phone number of the responsible official.
- Submit Annual Emissions Report (TEDi): Due annually, by the 31st of March unless otherwise directed by DEQ, to the Office of Environmental Assessment in a format specified by DEQ. Identify the quantity of emitters in the previous calendar year for any toxic air pollutant listed in Table 51.1 or Table 51.3.
- Submit notification: Due to the Department of Public Safety 24-hour Louisiana Emergency Hazardous Materials Hotline at (225) 925-6595 immediately, but in no case later than 1 hour, after any discharge of a toxic air pollutant into the atmosphere that results or threatens to result in an emergency condition (a condition which could reasonably be expected to endanger the health and safety of the public, cause significant adverse impact to the land, water or air environment, or cause severe damage to property).
- Submit notification: Due to SPOC, except as provided in LAC 33:III.5107.B.6, no later than 24 hours after the beginning of any unauthorized discharge into the atmosphere of a toxic air pollutant as a result of bypassing an emission control device, when the emission control bypass was not the result of an upset, and the quantity of the unauthorized bypass is greater than or equal to the lower of the Minimum Emission Rate (MER) in LAC 33:III.5112, Table 51.1, or a reportable quantity (RQ) in LAC 33:III.3931, or the quantity of the unauthorized bypass is greater than one pound and there is no MER or RQ for the substance in question. Submit notification in the manner provided in LAC 33:III.3931.
- Submit notification: Due to SPOC, except as provided in LAC 33:III.5107.B.6, immediately, but in no case later than 24 hours after any unauthorized discharge of a toxic air pollutant into the atmosphere that does not cause an emergency condition, the rate or quantity of which is in excess of that allowed by permit, compliance schedule, or variance, or for upset events that exceed the reportable quantity in LAC 33:III.3931.
- Submit notification in the manner provided in LAC 33:III.3923.
- Submit written report: Due by certified mail to SPOC within seven calendar days of learning of any such discharge or equipment bypass as referred to in LAC 33:III.5107.B.7 through B.9. Include the information specified in LAC 33:III.5107.B.4.a through B.4.a.viii.
- Report all discharges to the atmosphere of a toxic air pollutant from a safety relief device, a line or vessel rupture, a sudden equipment failure, or a bypass of an emission control device, regardless of quantity. If THEY CAN BE MEASURED AND CAN BE RELIABLY QUANTIFIED USING GOOD ENGINEERING PRACTICES, to DEQ along with the annual emissions report and where otherwise specified. Include the identity of the source, the date and time of the discharge, and the approximate total loss during the discharge.

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

AI 2083 - Taft/Star Facility

113 [LAC 33:III.5109.C]

Develop a standard operating procedure (SOP) within 120 days after achieving or demonstrating compliance with the standards specified in LAC 33:III, Chapter 51. Detail in the SOP all operating procedures or parameters established to ensure that compliance with the applicable standards is maintained and address operating procedures for any monitoring system in place, specifying procedures to ensure compliance with LAC 33:III.5113.C.5. Make a written copy of the SOP available on-site or at an alternate approved location for inspection by DEQ. Provide a copy of the SOP within 30 days upon request by DEQ.

114 [LAC 33:III.5113.A.1]

Submit notification in writing: Due to SPOC not more than 60 days nor less than 30 days prior to initial start-up. Submit the anticipated date of the initial start-up.

Submit notification in writing: Due to SPOC within 10 working days after the actual date of initial start-up of the source. Submit the actual date of initial start-up of the source.

An individual or company contracted to perform a demolition or renovation activity which disturbs RACM must be recognized by the Licensing Board for Contractors to perform asbestos abatement, and shall meet the requirements of LAC 33:III.5151.F.2 and F.3 for each demolition or renovation activity.

Activate the preplanned abatement strategy listed in LAC 33:III.5611.Table 5 when the administrative authority declares an Air Pollution Alert.

Activate the preplanned strategy listed in LAC 33:III.5611.Table 6 when the administrative authority declares an Air Pollution Warning.

Activate the preplanned abatement strategy listed in LAC 33:III.5611.Table 7 when the administrative authority declares an Air Pollution Emergency.

Prepare standby plans for the reduction of emissions during periods of Air Pollution Alert, Air Pollution Warning and Air Pollution Emergency. Design standby plans to reduce or eliminate emissions in accordance with the objectives as set forth in LAC 33:III.5611.Tables 5, 6, and 7. Comply with the provisions in 40 CFR 68, except as specified in LAC 33:III.5901.

Identify hazards that may result from accidental releases of the substances listed in 40 CFR 68.130, Table 59.0 of LAC 33:III.5907, or Table 59.1 of LAC 33:III.5913 using appropriate hazard assessment techniques, design and maintain a safe facility, and minimize the off-site consequences of accidental releases of such substances that do occur.

Submit amended registration: Due to the Office of Environmental Compliance within 60 days after the information in the submitted registration is no longer accurate.

Submit Emission Inventory (EI)/Annual Emissions Statement: Due annually, by the 31st of March for the period January 1 to December 31 of the previous year unless otherwise directed. Submit emission inventory data in the format specified by the Office of Environmental Assessment. Include all data applicable to the emissions source(s), as specified in LAC 33:III.919.A-D.

Report the unauthorized discharge of any air pollutant into the atmosphere in accordance with LAC 33:I, Chapter 39, Notification Regulations and Procedures for Unauthorized Discharges. Submit written reports to the department pursuant to LAC 33:I.3925. Submit timely and appropriate follow-up reports detailing methods and procedures to be used to prevent similar atmospheric releases.

EQT 0033 199A - Residue Tank (ID-1513)

126 [LAC 33:III.2103.A]

Equip with a submerged fill pipe.

127 [LAC 33:III.2103.H.3]

Determine VOC maximum true vapor pressure using the methods in LAC 33:III.2103.H.3.a-e.

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

EQT 0033 199A - Residue Tank (ID-1513)

Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Keep records of the information specified in LAC 33:III.2103.I.1 - 7, as applicable.

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.

Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ. MACT is determined to be routing emissions to a 95% efficient control device (carbon canisters).

EQT 0907 199B - Residue Tank (ID-1514)

VOC, Total >= 95 % reduction efficiency using a closed vent system and control device. Subpart Kb. [40 CFR 60.112b(a)(3)(ii)]
Which Months: All Year Statistical Basis: None specified

Equip with a closed vent system to collect all VOC vapors and gases discharged from the storage vessel and operate with no detectable emissions. Subpart Kb. [40 CFR 60.112b(a)(3)]
Equipment/operational data recordkeeping by electronic or hard copy monthly. Keep readily accessible records showing the dimension of the storage vessel and an analysis showing the capacity of the storage vessel. Keep copies of all records for the life of the source as specified by 40 CFR 60.116(b)(4). Subpart Kb. [40 CFR 60.116(b)(3)]

Equip with a submerged fill pipe.

Determine VOC maximum true vapor pressure using the methods in LAC 33:III.2103.H.3.a-c.
Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Keep records of the information specified in LAC 33:III.2103.I.1 - 7, as applicable.

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.

Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ. MACT is determined to be compliance with 40 CFR 60 Subpart Kb. Subpart Kb.

EQT 0908 199A - Carbon Canister

Equipment/operational data recordkeeping by electronic or hard copy monthly. Keep records of the monthly monitoring and dates of canister replacement, on site and available for inspection by the Office of Environmental Compliance, Surveillance Division

VOC, Total monitored by the regulation's specified method(s) monthly.
Monitor VOC breakthrough monthly using a portable VOC detector and replace canister as necessary to maintain a control efficiency of 95% minimum.
Which Months: All Year Statistical Basis: None specified

EQT 0909 199B - Carbon Canister

SPECIFIC REQUIREMENTS**AI ID: 2083 - Union Carbide Corp - St Charles Operations****Activity Number: PER20070043****Permit Number: 2104-V2****Air - Title V Regular Permit Renewal****EQT 0909 199B - Carbon Cannister**

- 141 [LAC 33:III.507.H.1.a] VOC, Total monitored by the regulation's specified method(s) monthly. Monitor VOC breakthrough monthly using a portable VOC detector and replace canisters as necessary to maintain a control efficiency of 95% minimum. Which Months: All Year Statistical Basis: None specified Equipment/operational data recordkeeping by electronic or hard copy monthly Keep records of the monthly monitoring and dates of canister replacement, on site and available for inspection by the Office of Environmental Compliance, Surveillance Division
- 142 [LAC 33:III.507.H.1.a] Equipment/operational data recordkeeping by electronic or hard copy monthly Keep records of the monthly monitoring and dates of canister replacement, on site and available for inspection by the Office of Environmental Compliance, Surveillance Division

EQT 0910 199C - Residue Tank (ID-1515)

- 143 [LAC 33:III.5107.A.2] Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B. Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ MACT is determined to be having a fixed roof tank with submerged fill loading.
- 144 [LAC 33:III.5109.A.1] Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ MACT is determined to be having a fixed roof tank with submerged fill loading.

EQT 0911 199D - Residue Tank (ID-1516)

- 145 [LAC 33:III.5107.A.2] Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B. Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ MACT is determined to be having a fixed roof tank with submerged fill loading.
- 146 [LAC 33:III.5109.A.1] Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ MACT is determined to be having a fixed roof tank with submerged fill loading.

EQT 0912 199F - Residue Tank (ID-1517)

- 147 [LAC 33:III.5107.A.2] Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B. Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ MACT is determined to be having a fixed roof tank with submerged fill loading.
- 148 [LAC 33:III.5109.A.1] Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ MACT is determined to be having a fixed roof tank with submerged fill loading.

EQT 0913 199G - Residue Tank (ID-1518)

- 149 [40 CFR 60.112b(a)(3)(ii)] VOC, Total $\geq 95\%$ reduction efficiency using a closed vent system and control device. Subpart Kb. [40 CFR 60.112b(a)(3)(ii)] Which Months: All Year Statistical Basis: None specified Equipment with a closed vent system and control device. Design the closed vent system to collect all VOC vapors and gases discharged from the storage vessel and operate with no detectable emissions. Subpart Kb. [40 CFR 60.112b(a)(3)] Equipment/operational data recordkeeping by electronic or hard copy monthly. Keep readily accessible records showing the dimension of the storage vessel and an analysis showing the capacity of the storage vessel. Keep copies of all records for the life of the source as specified by 40 CFR 60.116(b). Subpart Kb. [40 CFR 60.116(b)(ii)]

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

EQT 0913 199G - Residue Tank (ID-1518)

- 152 [LAC 33.III.2103.A] Equip with a submerged fill pipe.
 153 [LAC 33.III.2103.H.3] Determine VOC maximum true vapor pressure using the methods in LAC 33.III.2103.H.3.a-e.
 154 [LAC 33.III.2105.] Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Keep records of the information specified in LAC 33.III.2.03.I.1 - 7, as applicable.
 Include emissions of all toxic air pollutants listed in LAC 33.III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33.III.5105.B.
- 155 [LAC 33.III.5107.A.2] Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ MACT is determined to be compliance with 40 CFR 60 Subpart Kb, Subpart Kb.
- 156 [LAC 33.III.5109.A.1]

EQT 0914 199G - Carbon Cannister

- 157 [LAC 33.III.507.H.1.a] VOC. Total monitored by the regulation's specified method(s) monthly.
 Monitor VOC breakthrough monthly using a portable VOC detector and replace canisters as necessary to maintain a control efficiency of 95% minimum.
 Which Months: All Year Statistical Basis: None specified
 Equipment/operational data recordkeeping by electronic or hard copy monthly. Keep records of the monthly monitoring and dates of canister replacement, on site and available for inspection by the Office of Environmental Compliance, Surveillance Division
- 158 [LAC 33.III.507.H.1.a]

EQT 0915 199J - Surge Sump Tank

- 159 [LAC 33.III.5107.A.2] Include emissions of all toxic air pollutants listed in LAC 33.III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33.III.5105.B.
 Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ MACT is determined to be a fixed roof tank with submerged fill loading. Additionally, emissions are routed to the Equalization and Surge Wastewater Tank Header, EIQ 3233.
- 160 [LAC 33.III.5109.A.1]

EQT 0917 199K - Equalization Sump Tank

- 161 [LAC 33.III.5107.A.2] Include emissions of all toxic air pollutants listed in LAC 33.III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33.III.5105.B.
 Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ MACT is determined to be a fixed roof tank with submerged fill loading. Additionally, emissions are routed to the Equalization and Surge Wastewater Tank Header, EIQ 3233.
- 162 [LAC 33.III.5109.A.1]

EQT 0918 199L - Wastewater Surge Tank

SPECIFIC REQUIREMENTS**AN ID:** 2083 - Union Carbide Corp - St Charles Operations**Activity Number:** PER20070043**Permit Number:** 2104-V2**Air - Title V Regular Permit Renewal****EQT 0918 199L - Wastewater Surge Tank**

163. [LAC 33:III.5107.A.2]

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.

164. [LAC 33:III.5109.A.1]

Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ. MACT is determined to be a fixed roof tank with submerged fill loading. Additionally, emissions are routed to the Equilization and Surge Wastewater Tank Header, EIQ 3233.

EQT 0919 199M - Wastewater Equalization Tank

165 [LAC 33:III.5107.A.2]

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.

166 [LAC 33:III.5109.A.1]

Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ. MACT is determined to be a fixed roof tank with submerged fill loading. Additionally, emissions are routed to the Equilization and Surge Wastewater Tank Header, EIQ 3233.

EQT 0920 3201 - Sulfuric Acid Storage Tank

167 [LAC 33:III.5107.A.2]

Emiss Class III TAP only. Chapter 51 MACT is not required. Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.

EQT 0921 3204 - Process Vessel 11

168 [LAC 33:III.5107.A.2]

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.

169 [LAC 33:III.5109.A.1]

Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ. MACT is determined to be fixed roof tank with submerged filling. Additionally, emissions routed to UNOX Vent Collection Header, EIQ 3227.

EQT 0922 3205 - Process Vessel 12

170 [LAC 33:III.5107.A.2]

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.

171 [LAC 33:III.5109.A.1]

Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ. MACT is determined to be fixed roof tank with submerged filling. Additionally, emissions routed to UNOX Vent Collection Header, EIQ 3227.

EQT 0923 3206 - Process Vessel 13

172 [LAC 33:III.5107.A.2]

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations
Activity Number: PER20070043
Permit Number: 2104-V2
Air - Title V Regular Permit Renewal

EQT 0923 3206 - Process Vessel 13

173 [LAC 33:III.5109.A.1]

Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ. MACT is determined to be fixed roof tank with submerged filling. Additionally, emissions routed to UNOX Vent Collection Header, EIQ 3227.

EQT 0924 3207 - Process Vessel 21

174 [LAC 33:III.5107.A.2]

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.

Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ. MACT is determined to be fixed roof tank with submerged filling. Additionally, emissions routed to UNOX Vent Collection Header, EIQ 3227.

EQT 0925 3208 - Process Vessel 22

176 [LAC 33:III.5107.A.2]

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.

Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ. MACT is determined to be fixed roof tank with submerged filling. Additionally, emissions routed to UNOX Vent Collection Header, EIQ 3227.

EQT 0926 3209 - Process Vessel 23

178 [LAC 33:III.5107.A.2]

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.

Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ. MACT is determined to be fixed roof tank with submerged filling. Additionally, emissions routed to UNOX Vent Collection Header, EIQ 3227.

EQT 0927 3210 - Process Vessel 31

180 [LAC 33:III.5107.A.2]

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.

Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ. MACT is determined to be fixed roof tank with submerged filling. Additionally, emissions routed to UNOX Vent Collection Header, EIQ 3227.

EQT 0928 3211 - Process Vessel 32

182 [LAC 33:III.5107.A.2]

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.

Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ. MACT is determined to be fixed roof tank with submerged filling. Additionally, emissions routed to UNOX Vent Collection Header, EIQ 3227.

SPECIFIC REQUIREMENTS**AI ID: 2083 - Union Carbide Corp - St Charles Operations****Activity Number: PER20070043****Permit Number: 2104-V2****Air Title V Regular Permit Renewal****EQT 0929 3212 - Process Vessel 33**

184 [LAC 33:III.5107.A.2] Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
 Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ.
 MACT is determined to be fixed roof tank with submerged filling. Additionally, emissions routed to UNOX Vent Collection Header, EIQ 3227.

EQT 0930 3213 - Process Vessel 41

186 [LAC 33:III.5107.A.2] Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
 Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ.
 MACT is determined to be fixed roof tank with submerged filling. Additionally, emissions routed to UNOX Vent Collection Header, EIQ 3227.

EQT 0931 3214 - Process Vessel 42

188 [LAC 33:III.5107.A.2] Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
 Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ.
 MACT is determined to be fixed roof tank with submerged filling. Additionally, emissions routed to UNOX Vent Collection Header, EIQ 3227.

EQT 0932 3215 - Process Vessel 43

190 [LAC 33:III.5107.A.2] Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
 Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ.
 MACT is determined to be fixed roof tank with submerged filling. Additionally, emissions routed to UNOX Vent Collection Header, EIQ 3227.

EQT 0933 3219 - Diesel Pump 3

192 [LAC 33:III.1101.B] Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.
 Which Months: All Year Statistical Basis: None specified
 193 [LAC 33:III.1311.C] Opacity <= 20 percent; except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.
 Which Months: All Year Statistical Basis: Six-minute average

EQT 0934 3220 - No. 1 Firewater Diesel Pump

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SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

EQT 0934 3220 - No. 1 Firewater Diesel Pump

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Opacity <= 20 percent, except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: Six-minute average:

Operating time <= 100 hr/yr.

Noncompliance with this limitation: is a reportable violation of the permit. Notify the Office of Environmental Compliance, Enforcement Division if the total 1 hours of operation (during maintenance checks, readiness testing and repairs) exceeds the maximum listed in this specific condition for any twelve consecutive month period.

Which Months: All Year Statistical Basis: None specified

Operating time recordkeeping by electronic or hard copy monthly.

Keep records of the total hours of operation (maintenance checks, readiness testing and repairs) each month, as well as the total hours of operation (maintenance checks, readiness testing and repairs) for the last twelve months. Make records available for inspection by DEQ personnel.

Submit report: Due annually, by the 31st of March. Report the total hours of operation for the preceding calendar year to the Office of Environmental Compliance, Enforcement Division.

Operating time monitored by technically sound method at the approved frequency.

Permittee shall monitor equipment operation during maintenance checks, readiness testing and repairs.

Which Months: All Year Statistical Basis: None specified

EQT 0935 3221 - No. 2 Firewater Diesel Pump

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Opacity <= 20 percent, except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: Six-minute average:

EQT 0936 3222 - No. 3 Firewater Diesel Pump

Carbon monoxide <= 2.6 g/BHP-hr (3.5 g/KW-hr). Subpart III. [40 CFR 60.4205(c)]

Which Months: All Year Statistical Basis: None specified

Particulate matter (10 microns or less) <= 0.40 g/BHP-hr (0.54 g/KW-hr). Subpart III. [40 CFR 60.4205(c)]

Which Months: All Year Statistical Basis: None specified

SPECIFIC REQUIREMENTS**AID: 2083 - Union Carbide Corp - St Charles Operations****Activity Number: PER20070043****Permit Number: 2104-V2****Air - Title V Regular Permit Renewal****EQT 0936 3222 - No. 3 Firewater Diesel Pump**

- 204 [40 CFR 60.4205(c)] Non-methane hydrocarbons plus Nitrogen oxides $\leq 7.8 \text{ g/BHP-hr}$ (10.5 g/kW-hr). Subpart III. [40 CFR 60.4205(c)]
Which Months: All Year Statistical Basis: None specified
Operate and maintain stationary CI ICE according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer over the entire life of the engine. Subpart III.
Beginning October 1, 2007, use diesel fuel that meets the requirements of 40 CFR 80.510(a). Subpart III. [40 CFR 60.4207(a)]
Beginning October 1, 2010, use diesel fuel that meets the requirements of 40 CFR 80.510(b) for nonroad diesel fuel. Subpart III. [40 CFR 60.4207(b)]
- Operating time monitored by hour/time monitor continuously during operation. Install a non-resettable hour meter prior to startup of the engine. Subpart III. [40 CFR 60.4209(a)]
Which Months: All Year Statistical Basis: None specified
Operate and maintain the stationary CI internal combustion engine and control device according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer. In addition, only change those settings that are permitted by the manufacturer. Also meet the requirements of 40 CFR 89, 94 and/or 1068, as applicable. Subpart III. [40 CFR 60.4211(a)]
Ensure engine is certified to the emission standards in 40 CFR 60.4204(b), or 40 CFR 60.4025(b) or (c), as applicable, for the same model year and maximum (or in the case of fire pumps, NFPA nameplate) engine power. Install and configure according to the manufacturer's specifications. Subpart III. [40 CFR 60.4211(c)]
Emergency stationary ICE may be operated for the purpose of maintenance checks and readiness testing. Maintenance checks and readiness testing of such units is limited to 100 hours per year. There is no time limit on the use of emergency stationary ICE in emergency situations. Anyone may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency ICE beyond 100 hours per year. For owners and operators of emergency engines meeting standards under 40 CFR 60.4205 but not 40 CFR 60.4204, any operation other than emergency operation, and maintenance and testing as permitted in this section, is prohibited. [40 CFR 60.4211(e)]
Opacity ≤ 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.
- Which Months: All Year Statistical Basis: None specified
Opacity ≤ 20 percent; except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.
- Which Months: All Year Statistical Basis: Six-minute average
Opacity ≤ 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.
- Which Months: All Year Statistical Basis: None specified

EQT 0937 3223 - No. 4 Firewater Diesel Pump

- 214 [LAC 33:III.1101.B]

Opacity ≤ 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

SPECIFIC REQUIREMENTS

AI-ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air • Title V Regular Permit Renewal

EQT 0937 3223 - No. 4 Firewater Diesel Pump

215 [LAC 33:III.1311.C]

Opacity <= 20 percent; except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: Six-minute average

EQT 0938 3224 - Return Firewater Diesel Pump

216 [LAC 33:III.1101.B]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or launcing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Opacity <= 20 percent; except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes;

Which Months: All Year Statistical Basis: Six-minute average

Operating time recordkeeping by electronic or hard copy monthly.

Keep records of the total hours of operation (maintenance checks, readiness testing and repairs) each month, as well as the total hours of operation (maintenance checks, readiness testing and repairs) for the last twelve months. Make records available for inspection by DEQ personnel.

Submit report, Due annually, by the 31st of March. Report the total hours of operation for the preceding calendar year to the Office of Environmental Compliance, Enforcement Division.

Operating time <= 100 hr/yr.

Noncompliance with this limitation is a reportable violation of the permit. Notify the Office of Environmental Compliance, Enforcement Division if the total hours of operation (during maintenance checks, readiness testing and repairs) exceeds the maximum listed in this specific condition for any twelve consecutive month period.

Which Months: All Year Statistical Basis: None specified

Operating time monitored by technically sound method at the approved frequency.

Permittee shall monitor equipment operation during maintenance checks, readiness testing and repairs.

Which Months: All Year Statistical Basis: None specified

EQT 0939 3225 - No. 6 Firewater Diesel Pump

222 [LAC 33:III.1101.B]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or launcing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Opacity <= 20 percent; except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: Six-minute average

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SPECIFIC REQUIREMENTS**AI ID: 2083 - Union Carbide Corp - St Charles Operations****Activity Number: PER20070043****Permit Number: 2104-V2****Air - Title V Regular Permit Renewal****EQT 0940 3226 - Sump Tank**

224 [LAC 33:III.5107.A.2]

225 [LAC 33:III.5109.A.1]

Emits Class I and/or Class II TAP less than the MER (facility wide). Chapter 51 MACT is not required. Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B. Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ. MACT is determined to be fixed roof tank with submerged filled loading.

EQT 0962 3248 - E-1 Olefins 1 Sump

226 [LAC 33:III.5107.A.2]

227 [LAC 33:III.5109.A.1]

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B. Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ. No additional controls required determined as MACT.

EQT 0963 3249 - E-2 EA-1Sump228 [LAC 33:III.5107.A.2]
229 [LAC 33:III.5109.A.1]

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B. Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ. No additional controls required determined as MACT.

EQT 0964 3250 - E-3A Oxide 1 Sump230 [LAC 33:III.5107.A.2]
231 [LAC 33:III.5109.A.1]

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B. Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ. No additional controls required determined as MACT.

EQT 0965 3251 - E-3B Oxide 2 Sump232 [LAC 33:III.5107.A.2]
233 [LAC 33:III.5109.A.1]

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B. Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ. No additional controls required determined as MACT.

EQT 0966 3252 - E-3C Oxide Tank Car Sump

234 [LAC 33:III.5107.A.2]

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.

SPECIFIC REQUIREMENTS

AID: 2083 - Union Carbide Corp - St Charles Operations
 Activity Number: PER20070043
 Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

EQT 0966 3252 - E-3C Oxide Tank Car Sump

235 [LAC 33:III.5109.A.1] Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ
 No additional controls required determined as MACT.

EQT 0967 3253 - E-5 Site No. 1 Shipping Sump

236 [LAC 33:III.5107.A.2] Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
 Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ

237 [LAC 33:III.5109.A.1] No additional controls required determined as MACT.

EQT 0968 3254 - E-6 Butanol 1 Sump

238 [LAC 33:III.5107.A.2] Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
 Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ

239 [LAC 33:III.5109.A.1] No additional controls required determined as MACT.

EQT 0969 3255 - E-7 Acrylics Sump

240 [LAC 33:III.5107.A.2] Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
 Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ

241 [LAC 33:III.5109.A.1] No additional controls required determined as MACT.

EQT 0970 3256 - E-8 Butanol 1 Sump

242 [LAC 33:III.5107.A.2] Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
 Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ

243 [LAC 33:III.5109.A.1] No additional controls required determined as MACT.

EQT 0971 3257 - E-11 Site No. 4 TIC Sump

244 [LAC 33:III.5107.A.2] Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
 Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ

245 [LAC 33:III.5109.A.1] No additional controls required determined as MACT.

SPECIFIC REQUIREMENTS**AN ID:** 2083 - Union Carbide Corp - St Charles Operations**Activity Number:** PER20070043**Permit Number:** 2104-V2**Air - Title V Regular Permit Renewal****EQT 0972 3258 - E-17 EA-2 Flare Sump**

- 246 [LAC 33:III.5107.A.2]
Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ.
No additional controls required determined as MACT.

EQT 0973 3259 - E-18 Site Logistics Sump A

- 248 [LAC 33:III.5107.A.2]
Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ.
No additional controls required determined as MACT.

EQT 0974 3260 - E-19 Site Logistics Sump B

- 250 [LAC 33:III.5107.A.2]
Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ.
No additional controls required determined as MACT.

EQT 0975 3262 - E-21 Olefins 2 Sump

- 252 [LAC 33:III.5107.A.2]
Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ.
No additional controls required determined as MACT.

EQT 0976 3263 - E-22 EA-2 Sump

- 254 [LAC 33:III.5107.A.2]
Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ.
No additional controls required determined as MACT.

EQT 0977 3264 - E-24A SPU WW Sump

- 256 [LAC 33:III.5107.A.2]
Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.

SPECIFIC REQUIREMENTS

AID: 2083 - Union Carbide Corp - St Charles Operations
 Activity Number: PER20070C43
 Permit Number: 2104-V2
 Air - Title V Regular Permit Renewal

EQT 0977 3264 - E-24A SPU WW Sump

Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ.
 No additional controls required determined as MACT.

EQT 0978 3266 - E-28A SE Corner of Latex Block Sump

Include emissions of all toxic air pollutants listed in LAC 33:III.5105.B, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
 Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ.
 No additional controls required determined as MACT.

EQT 0979 3267 - E-28B SW Corner of Latex Block Sump

Include emissions of all toxic air pollutants listed in LAC 33:III.5105.B, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
 Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ.
 No additional controls required determined as MACT.

EQT 0982 200 - Tank Truck Loading

Include emissions of all toxic air pollutants listed in LAC 33:III.5105.B, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
 Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ.
 MACT is determined to be vapor balancing.

FUG 0020 196S - Fugitives

Comply with LA Non-HON MACT, NSPS 40 CFR 60 Subpart V V and LAC 33:III.2121 by implementing the Louisiana Consolidated Fugitive Emission Program Guidelines. Compliance is achieved through compliance with LA Non-HON MACT.
 Emits Class I and/or Class II TAP less than the MER (facility wide). Chapter 51 MACT is not required. Include emissions of all toxic air pollutants listed in LAC 33:III.5105.B, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under LAC 33:III.5105.B.
 Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ.
 MACT is determined to be compliance with LA Non-HON MACT as applicable.
 Compressors: Equip with a closed-vent system capable of capturing and transporting any leakage from the seal to a control device that complies with the requirements of Section N, except as provided for in Subsection E.10, as specified in Paragraph E.9 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Alternative to Subsections E.1 through E.7.

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

FUG 0020 196S : Fugitives

268 [LAC 33:III.5109.A]

Valves in gas/vapor service and in light liquid service (percent leaking valves ≥ 4): VOC, Total monitored by the regulation's specified method(s) monthly, as specified in Subsection I.7 of the Louisiana MACT Determination for Non-HON Equipment Leak (March 30, 1995). Monitor using the method specified in Subsection P.2. Initiate monthly monitoring within 60 days of the previous monitoring and continue until the percent of leaking valves is less than 4% at which time monitoring can be performed in accordance with Subsection I.1.

269 [LAC 33:III.5109.A]

Which Months: All Year Statistical Basis: None specified
 Connectors in gas/vapor service and in light liquid service (≤ 1 inch in diameter): VOC, Total monitored by the regulation's specified method(s) within 90 days after being returned to VOTAP service. Monitor each connector that has been opened or has otherwise had the seal broken, as specified in Paragraph O.8.b of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Monitor using the method specified in Section P. If the follow-up monitoring detects a leak, initiate repair provisions specified in Subsection O.9. Comply with this requirement instead of the requirements in Paragraph O.2.

270 [LAC 33:III.5109.A]

Which Months: All Year Statistical Basis: None specified
 Pressure relief device in gas/vapor service: VOC, Total < 500 ppm except during pressure releases, as measured by the method specified in Section P.3, as specified in Section F.1 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

271 [LAC 33:III.5109.A]

Which Months: All Year Statistical Basis: None specified
 Sampling connection systems: Equip with a closed-purge system or closed-vent system, except as provided for in Section C, as specified in Subsection G.1 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Ensure that this system collects or captures the sample purge for return to the process.

272 [LAC 33:III.5109.A]

Valves in gas/vapor service and in light liquid service: VOC, Total monitored by the regulation's specified method(s) quarterly, as specified in Subsection I.1 of the Louisiana MACT Determination for Non-HON Equipment Leak (March 30, 1995). Monitor using the method specified in Subsection P.2. If an instrument reading of 1000 ppm or greater is measured, a leak is detected. If a leak is detected, initiate repair provisions specified in Subsection O.9, except as provided in Section M.

273 [LAC 33:III.5109.A]

Which Months: All Year Statistical Basis: None specified
 Connectors in gas/vapor service and in light liquid service: VOC, Total monitored by the regulation's specified method(s) once initially, as specified in Subsections O.1 and O.2 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Monitor using the method specified in Section P. If an instrument reading ≥ 1000 ppm is measured, a leak is detected. If a leak is detected, initiate repair provisions specified in Subsection O.9, except as provided in Section M.

274 [LAC 33:III.5109.A]

Which Months: All Year Statistical Basis: None specified
 Attach a weatherproof and readily visible identification, marked with the equipment identification, to leaking equipment, as specified in Subsection Q.2 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).
 Compressors (no detectable emissions): Demonstrate that the compressor is operating with no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, as measured by the method specified in Subsection P.3, as specified in Paragraph E.10.a of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Comply with this requirement instead of the requirements in Subsections E.2 through E.9.

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations
 Activity Number: PER20070043
 Permit Number: 2104-V2
 Air - Title V Regular Permit Renewal

FUG 0020 196S - Flugitives

276 [LAC 33:II.5109.A]

Pumps in light liquid service (unmanned plant site): Presence of a leak monitored by visual inspection/determination at the regulation's specified frequency, as specified in Subparagraph D.6 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Monitor pump as often as practicable and at least monthly. Comply with this requirement instead of the weekly visual inspection requirements in Paragraphs D.1.b and D.4.d, and the daily requirements in Paragraph D.4.e.i.

277 [LAC 33:II.5109.A]

Sampling connection systems (closed-purge or closed-vent system): Return the purged process fluid directly to the process line with zero VOTAP emissions to the atmosphere, or collect and recycle the purged process fluid with zero VOTAP emissions to the atmospheric, or be designed and operated to capture and transport all the purged process fluid to a control device that complies with the requirements of Section N, as specified in Subsection G.2 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

278 [LAC 33:II.5109.A]

Connectors in gas/vapor service and in light liquid service: Repair Leaks as soon as practicable, but not later than 15 calendar days after a leak is detected, except as provided in Subsection O.8. Make a first attempt at repair no later than 5 calendar days after each leak is detected. If a leak is detected, monitor the for leaks within the first 90 days after its repair, as specified in Subsection O.9 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

279 [LAC 33:II.5109.A]

Pumps in light liquid service (dual mechanical seal system): Equip each barrier fluid system with a sensor that will detect failure of the seal system, the barrier fluid system, or both, as specified in Paragraph D.4.c of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Comply with this requirement instead of the requirements in Subsection D.1.

280 [LAC 33:II.5109.A]

Connectors in gas/vapor service and in light liquid service: (Percent of leaking connectors ≤ 2): VOC, Total monitored by the regulation's specified method(s) annually, as specified in Subsections O.2 and O.4 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Monitoring must be performed within one year from the previous monitoring. Monitor using the method specified in Section P. If an instrument reading ≥ 1060 ppm is measured, a leak is detected. If a leak is detected, initiate repair provisions specified in Subsection O.9, except as provided in Section N.

281 [LAC 33:II.5109.A]

Which Month: All Year Statistical Basis: None specified
 Open-ended valves or lines: Equip with a cap, blind flange, plug, or a second valve that seals the open end at all times except during operations requiring process fluid flow through the open-ended valve or line or during maintenance and repair, as specified in Subsection H.1 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

282 [LAC 33:II.5109.A]

Pumps in light liquid service (dual mechanical seal system): Operate with the barrier fluid at a pressure that is at all times greater than the pump stuffing box pressure, or equip with a barrier fluid degassing reservoir that is connected by a closed-vent system to a control device that complies with the requirements of Section N, or equip with a system that purges the barrier fluid into a process stream with zero VOTAP emissions to the atmospheric, as specified in Paragraph D.4.a of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Comply with this requirement instead of the requirements in Subsection D.1.

283 [LAC 33:II.5109.A]

Pumps in light liquid service (dual mechanical seal system): Determine, based on design considerations and operating experience, a criterion that indicates failure of the seal system, the barrier fluid system, or both, as specified in Subparagraph D.4.e.ii of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Comply with this requirement instead of the requirements in Subsection D.1.

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations
 Activity Number: PER20070043
 Permit Number: 2104-V2
 Air - Title V Regular Permit Renewal

FUG 0020 196S - Fugitives

284 [LAC 33:III.5109.A]

Pumps in light liquid service (dual mechanical seal system): Equipment/operational data monitored by visual inspection/determination daily. Check sensor daily or equip with an audible alarm, as specified in Subparagraph D.4.e.i of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). If the sensor indicates failure of the seal system, the barrier fluid system, or both based on the criterion determined in Paragraph D.4.e.ii, a leak is detected. If a leak is detected, initiate repair provisions specified in Paragraphs D.3.a and D.3.b.

Comply with this requirement instead of the requirements in Subsection D.1.

285 [LAC 33:III.5109.A]

Comply with the test methods and procedures in Section P, as specified in Subsections P.1 through P.5 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

286 [LAC 33:III.5109.A]

Compressors: Equip each barrier-fluid system as described in Subsection E.5 of the Louisiana MACT Determination for Non-HON Equipment Leaks system, the barrier fluid system, or both, as specified in Subsection E.5 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

287 [LAC 33:III.5109.A]

Compressors (seal system): Operate with the barrier fluid at a pressure that is greater than the compressor stuffing box pressure, or equip with a barrier fluid system that is connected by a closed-vent system to a control device that complies with the requirements of Section N, or equip with a system that purges the barrier fluid into a process stream with zero VOTP emission to the atmosphere, as specified in Subsection E.3 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

288 [LAC 33:III.5109.A]

Valves in gas/vapor service and in liquid service (difficult-to-monitor): VOC, T, total monitored by the regulation's specified method(s) at the regulation's specified frequency. Maintain a written plan that requires monitoring of the valve at least once per calendar year, as specified in Subsection 1.6.c of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Monitor using the method specified in Subsection P.2. Comply with this requirement instead of the requirements in Subsection I.1.

289 [LAC 33:III.5109.A]

Which Months: All Year Statistical Basis: None specified
 Compressors: Determine, based on design considerations and operating experience, a criterion that indicates failure of the seal system, the barrier fluid system, or both, as specified in Paragraph E.6.b of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

290 [LAC 33:III.5109.A]

Connectors in gas/vapor service and in liquid service (unsafe-to-monitor): Determine that the connector is unsafe to monitor because personnel would be exposed to an immediate danger as a result of complying with Subsections O.2 through O.6, as specified in Subsection O.10.a of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Comply with this requirement instead of the requirements in Subsection O.2 through O.6.

291 [LAC 33:III.5109.A]

Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Keep records of the information specified in Subsections Q.1 through Q.13 as applicable, as specified in Section Q of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995)

292 [LAC 33:III.5109.A]

Valves in gas/vapor service and in liquid service (skip period leak detection and repair): Notify DEQ 30 days before implementing any of the alternate provisions of Section J, as specified in Subsection R.4 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

FUG 0020 196S - Fugitives

293 [LAC 33:III.5109.A]

Pumps in light liquid service: VOC, Total monitored by the regulation's specified method(s) quarterly. Monitor to detect leaks using the methods specified in Subsection P.2, except as provided in Subsection C.4 and Subsections D.4, D.5, and D.6, as specified in Paragraph D.1.a of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). If an instrument reading of 2000 ppm or greater is measured, a leak is detected. If a leak is detected, initiate repair provisions as specified in Subsection D.3.

294 [LAC 33:III.5109.A]

Identify each piece of equipment in a process unit subject to this MACT determination such that it can be distinguished readily from equipment that is not subject to this MACT determination, as specified in Subsection C.3 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

295 [LAC 33:III.5109.A]

Instrument systems and pressure relief devices in liquid service; and pumps, valves, connectors, and agitators in heavy liquid service: Repair leaks as soon as practicable, but not later than 15 calendar days after a leak is detected, except as provided in Section M1, as specified in Subsection K.3 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Make a first attempt at repair no later than 5 calendar days after each leak is detected.

296 [LAC 33:III.5109.A]

Pumps in light liquid service: Equip with a closed-vent system capable of capturing and transporting any leakage from the seal or seals to a control device that complies with the requirements of Section N1, as specified in Paragraph D.5 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Alternative to Subsections D.1 through D.4.

297 [LAC 33:III.5109.A]

Compressors: Equipment/operational data monitored by technically sound method daily, as specified in Paragraph E.6.a of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Check each sensor as required in Subsection E.5 daily or equip with an audible alarm unless the compressor is located within the boundary of an unmanned plant site. If the sensor indicates failure of the seal system, the barrier fluid system, or both based on criterion determined under Paragraph E.6.b, a leak is detected. If a leak is detected, initiate repair provisions specified in Subsection E.6.

298 [LAC 33:III.5109.A]

Which Months: All Year Statistical Basis: None specified
Compressors: Equip with a seal system that includes a barrier fluid system and that prevents leakage of process fluid to the atmosphere, except as provided for in Subsections C.4, E.9 and E.10, as specified in Subsection E.2 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

299 [LAC 33:III.5109.A]

Surge control vessels and bottoms receivers: Equip each surge control vessel and bottoms receiver that is not routed back to the process with a closed-vent system that routes the organic vapors vented from the vessel back to the process or to a control device that complies with the requirements of Section N or to an alternate method of control which has been approved by DEQ, as specified in Section L of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

300 [LAC 33:III.5109.A]

VOC, Total recordkeeping by logbook within 90 days of placing equipment back in service that had been physically removed from service, disassembled or dismantled. Maintain records as required in Subsection Q.5, as specified in Subsection C.5 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

301 [LAC 33:III.5109.A]

Pressure relief device in gas/vapor service: VOC, Total monitored by the regulation's specified method(s) within 5 days (calendar) after the pressure release to confirm the condition of no leakage, as indicated by an instrument reading of less than 500 ppm above background, as specified in Section F.2.b of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Monitor using the method specified in Subsection P.3.
Which Months: All Year Statistical Basis: None specified

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

FUG 0020 196S - Fugitives

302 [LAC 33:III.5109.A]

Connectors in gas/vapor service and in light liquid service (welded completely around the circumference of the interface or physically removed and the pipe welded together): Equipment/operational data monitored by the regulation's specified method(s) within three months after being welded. Check the integrity of the weld by monitoring according to the procedures in Section P or by testing using x-ray, acoustic monitoring, hydrotesting, or other applicable method, as specified in Subsection O.7 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Comply with this requirement instead of the requirements in Subsection O.

Which Months: All Year Statistical Basis: None specified

Open-ended valves or lines: Monitor and repair in accordance with Section I, as specified in Subsection H.4 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

304 [LAC 33:III.5109.A]

Connectors in gas/vapor service and in light liquid service (opened or otherwise had the seal broken): VOC, Total monitored by the regulation's specified method(s) within 90 days after being returned to VOTAP service. Monitor each connector that has been opened or has otherwise had the seal broken, including those determined to be unrepairable prior to process unit shutdown, as specified in Paragraph O.8.a of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Monitor using the method specified in Section P. If the follow-up monitoring detects a leak, initiate repair provisions specified in Subsection O.9, unless it is determined to be unrepairable, in which case it is counted as unrepairable.

Which Months: All Year Statistical Basis: None specified

Instrument systems and pressure relief devices in liquid service; and pumps, valves, connectors, and agitators in heavy liquid service: VOC, Total monitored by the regulation's specified method(s) within 5 days of finding evidence of a potential leak by visual, audible, olfactory, or any other detection method, as specified in Section K.1 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Monitor using the method specified in Subsection P.2. If an instrument reading of 10000 ppm or greater for agitators, 2000 ppm or greater for pumps or 1000 ppm or greater for valves, connectors, instrument systems, or pressure relief devices is measured, a leak is detected. If a leak is detected, initiate repair provisions specified in Subsection K.3.

305 [LAC 33:III.5109.A]

Which Months: All Year Statistical Basis: None specified

Pumps in light liquid service: Presence of a leak monitored by visual inspection/determination weekly (calendar), as specified in Paragraph D.1.b of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). If there are indications of liquids dripping from the pump seal, monitor within 5 days by the methods specified in Subsection P.2.

306 [LAC 33:III.5109.A]

Which Months: All Year Statistical Basis: None specified

Connectors in gas/vapor service and in light liquid service (unsafe-to-monitor): VOC, Total monitored by the regulation's specified method(s) at the regulation's specified frequency. Maintain a written plan that requires monitoring as frequently as practicable during safe to monitor periods, as specified in Subsection O.10.b of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Monitor using the method in Section P. Comply with this requirement instead of the requirements in Subsection O.2 through O.6.

307 [LAC 33:III.5109.A]

Which Months: All Year Statistical Basis: None specified

Pumps in light liquid service (dual mechanical seal system): Ensure that the barrier fluid is not in VOTAP service and, if the pump is covered by standards under NSPS, is not in VOC service, as specified in Paragraph D.4.b of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Comply with this requirement instead of the requirements in Subsection D.1.

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations
 Activity Number: PER20070043
 Permit Number: 2104-V2
 Air - Title V Regular Permit Renewal

FUG 0020 196S - Fugitives

309 [LAC 33:III.5109.A]

Pumps in light liquid service (dual mechanical seal system): Presence of a leak monitored by visual inspection/determination weekly (calendar), as specified in Paragraph D.4.d of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). If there are indications of liquids dripping from the pump seal, a leak is detected. If a leak is detected, initiate repair provisions specified in Paragraphs D.3.a and D.3.b. Comply with this requirement instead of the requirements in Subsection D.1.

310 [LAC 33:III.5109.A]

Compressors (no detectable emissions): VOC. Total monitored by the regulation's specified method(s) once initially upon designation, annually, and at other times requested by DEQ, as specified in Paragraph E.10.b of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Comply with this requirement instead of the requirements in Subsections E.2 through E.9.

311 [LAC 33:III.5109.A]

Valves in gas/vapor service and in light liquid service (unsafe-to-monitor): VOC. Total monitored by the regulation's specified method(s) at the regulation's specified frequency. Maintain a written plan that requires monitoring of the valve as frequently as practicable during safe-to-monitor times, as specified in Subsection I.5.b of the Louisiana MACT Determination for Refinery Equipment Leaks (July 26, 1994). Monitor using the method specified in Subsection P.2. Comply with this requirement instead of the requirements in Subsection I.1.

312 [LAC 33:III.5109.A]

Which Months: All Year Statistical Basis: None specified
 VOC. Total monitored by technically sound method within 90 days of placing equipment back in service that had been physically removed from service, disassembled or dismantled to determine if it is leaking, as specified in Subsection C.5 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

313 [LAC 33:III.5109.A]

Which Months: All Year Statistical Basis: None specified
 Valves in gas/vapor service and in light liquid service (unsafe-to-monitor): Demonstrate that the valve is unsafe to monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with Subsection I.1, as specified in Subsection I.5.a of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Comply with this requirement instead of the requirements in Subsection I.1.

314 [LAC 33:III.5109.A]

Connectors in gas/vapor service and in light liquid service (percent of leaking connectors > 2): VOC. Total monitored by the regulation's specified method(s) quarterly until good performance is obtained or until four quarterly monitorings have been performed, as specified in Subsections O.2 and O.5 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). If good performance has not been obtained after four quarters of monitoring, monitor the remaining unchecked connectors within six months of the last quarterly monitoring period, as specified in Subsection O.6 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). If monitoring of the remaining connectors indicates good performance, monitor in accordance with Subsection O.4. If monitoring of the remaining connectors indicates that good performance has not been obtained, monitor in accordance with Subsection O.5. Monitor using the method specified in Section P. If an instrument reading ≥ 1000 ppm is measured, a leak is detected. If a leak is detected, initiate repair provisions specified in Subsection O.9, except as provided in Section M.

315 [LAC 33:III.5109.A]

Which Months: All Year Statistical Basis: None specified
 Valves in gas/vapor service and in light liquid service: Repair leaks as soon as practicable, but no later than 15 calendar days after a leak is detected, except as provided in Section M, as specified in Subsection I.3 and I.4 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Make a first attempt at repair no later than 5 calendar days after each leak is detected.

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations
 Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

FUG 0020 196S - Fugitives

316 [LAC 33:III.5109.A] Valves in gas/vapor service and in light liquid service (percent leaking valves ≤ 2 for two consecutive semiannual leak detection periods): VOC, Total monitored by the regulation's specified method(s) annually, as specified in Paragraph J.2.b of the Louisiana MACT Determination for Non-HON Equipment Leak (March 30, 1995). Monitor using the method specified in Section P. If the percentage of valves leaking is greater than 2 for any monitoring period, comply with the requirements as described in Section I, as specified in Paragraph J.2.c of the Louisiana MACT Determination for Refinery Equipment Leaks (July 26, 1994). Optional alternative to quarterly monitoring.

317 [LAC 33:III.5109.A] Connectors in gas/vapor service and in light liquid service (≤ 1 inch in diameter): Comply with the requirements of Section K, as specified in Paragraph O.8.b of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Comply with this requirement instead of the requirements in Paragraph O.2.

318. [LAC 33:III.5109.A] Pressure relief device in gas/vapor service: After each pressure release, return to a condition of no leakage, as indicated by an instrument reading of less than 500 ppm, as soon as practicable, but no later than five calendar days after each pressure release, except as provided in Section M, as specified in Section F.2.a of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

319 [LAC 33:III.5109.A] Submit report: Due semiannually starting six months after the initial report required in Subsection R.1. Include the information specified in Paragraphs R.2.a through R.2.e, as specified in Subsection R.2 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

320 [LAC 33:III.5109.A] Valves in gas/vapor service and in light liquid service (difficult-to-monitor): Demonstrate that the valve cannot be monitored without elevating the monitoring personnel more than two meters above a support service, as specified in Subsection I.6.a of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Comply with this requirement instead of the requirements in Subsection I.1. Connectors in gas/vapor service and in light liquid service: Calculate the percent leaking connectors using the equation in Subsection O.12 for use in determining the monitoring frequency, as specified in Subsection Q.12 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

321 [LAC 33:III.5109.A] Pumps in light liquid service: Repair leaks as soon as practicable, but not later than 15 calendar days after a leak is detected, except as provided in Section M, as specified in Subsection D.3 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Make a first attempt at repair no later than 5 calendar days after each leak is detected.

322 [LAC 33:III.5109.A] Compressors: Repair leaks as soon as practicable, but not later than 15 calendar days after a leak is detected, except as provided in Section M, as specified in Subsection E.8 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Make a first attempt at repair no later than 5 calendar days after each leak is detected.

323 [LAC 33:III.5109.A] Valves in gas/vapor service and in light liquid service (percent leaking valves ≤ 2 for two consecutive quarterly leak detection periods): VOC, Total monitored by the regulation's specified method(s) semiannually, as specified in Paragraph J.2.a of the Louisiana MACT Determination for Non-HON Equipment Leak (March 30, 1995). Monitor using the method specified in Section P. If the percentage of valves leaking is greater than 2 for any monitoring period, comply with the requirements as described in Section I, as specified in Paragraph J.2.c of the Louisiana MACT Determination for Refinery Equipment Leaks (July 26, 1994). Optional alternative to quarterly monitoring.

Which Months: All Year Statistical Basis: None specified

SPECIFIC REQUIREMENTS

AI ID: 2083 - Union Carbide Corp - St Charles Operations
Activity Number: PER20070043
Permit Number: 2104-Y2
Air 1 Title V Regular Permit Renewal

FUG 00020 196S - Fugitives

- 325 [LAC 33:III.5109.A]

- 325 [LAC 33:III.5109.A]
 326 [LAC 33:III.5109.A]
 327 [LAC 33:III.5109.A]

- 328 [LAC 33:111.5109.A]

- 329 " [LAC 33:III.5 (C9.A)]

- 332 [LAC 33:III S107.A.2]
333 [LAC 33:III S109.A.1]

Compressors (seal system): VOC, Total monitored by the regulation's specified method(s) quarterly, as specified in Subsection E.1 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Monitor to detect leaks using the methods specified in Section P. If an instrument reading of 5000 ppm is measured, a leak is detected. If a leak is detected, initiate repair provisions specified in Subsection E.8.

Which Months: All Year Statistical Basis: None specified Operate in a manner such that the valve on the process fluid end is closed before the Open-ended valves or lines (equipped with a second valve). Operate in a manner such that the valve on the process fluid end is closed before the second valve is closed, as specified in Subsection H.2 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Pressure relief device in gas/vapor service: Equip with a closed-vent system capable of capturing and transporting leakage from the pressure relief device to a control device as described in Section N, as specified in Section F.2.b of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Alternative to Subsections E.1 and F.2.

Connectors in gas/vapor service and in liquid service (inaccessible or glass-lined): Repair leaks as soon as practicable, but no later than 15 calendar days after detecting a leak by visual, audible, olfactory or other means, except as specified in Subsection O.8, as specified in Subsection O.11.b of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Make a first attempt at repair no later than 5 calendar days after the leak is detected, as specified in Subsection O.11.c of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995). Comply with this requirement instead of the monitoring requirements of Subsection O.2 through O.6 and

the recordkeeping and reporting requirement.

Delay of Repair. Repair equipment before the end of the next process unit shutdown, if repair is technically infeasible without a process unit

Compressors: Ensure that the barrier fluid is not in VOTAP service and, if the compressor is covered by a standard under NSPS, is not in VOC shutdown, as specified in Subsection M.1 of the Louisiana MACT Determination for Non-HON Equipment Leaks (March 30, 1995).

CBB 0153 : WWTE-CAB : Wastewater Treatment Facility Can

Group Members: EQT 0915EQT 0917EQT 0919EQT 0921EQT 0922EQT 0923EQT 0924EQT 0925EQT 0926EQT 0927EQT 0928EQT 0929EQT 0930EQT 0931EQT 0932EQT 0940EQT 0941EQT 0942EQT 0943EQT 0944EQT 0945EQT 0946EQT 0947EQT 0948EQT 0949EQT 0950EQT 0951EQT 0952EQT 0953EQT 0954EQT 0955EQT 0956EQT 0957EQT 0958EQT 0959EQT 0960EQT 0961EQT 0962EQT 0963EQT 0964EQT 0965EQT 0966EQT 0967EQT 0968EQT 0969EQT 0970EQT 0971EQT 0972EQT 0973EQT 0974EQT 0975EQT 0976EQT 0977EQT

331 [LAC 33-III.501.C.6]

110,000 lbs/day. The total carbon loading shall be recorded each day, as well as the flow and total carbon concentration. These records shall be kept on site and available for inspection. Total carbon loading shall be considered a violation of this permit and must be reported to the Office of Environmental Quality, Enforcement Division. A report showing the total carbon loading for the preceding calendar year shall be submitted to the Office of Environmental Compliance, Enforcement Division by March 31.

Include emissions of all toxic air pollutants listed in LAC 33:III.5112, Table 51.1 or 51.3 in the Annual Emissions Report unless exempted under i.AC 33:II.5105.B.

Control emissions of toxic air pollutants to a degree that constitutes Maximum Achievable Control Technology (MACT) as approved by DEQ.

SPECIFIC REQUIREMENTS**AI ID: 2083 - Union Carbide Corp - St Charles Operations****Activity Number: PER20070043****Permit Number: 2104-V2****Air - Title V Regular Permit Renewal****UNF 0009 EnvOps - Wastewater Treatment Facility (WWTF)**

334 [40 CFR 70.5(a)(1)(iii)]

335 [40 CFR 70.6(a)(3)(iii)(A)]

336 [40 CFR 70.6(a)(3)(iii)(B)]

337 [40 CFR 70.6(c)(5)(iv)]

338 [LAC 33:III.535]

Submit Title V permit application for renewal: Due 6 months before permit expiration date. [40 CFR 70.5(a)(1)(iii)]

Submit Title V monitoring results report: Due semiannually, by March 31st and September 30th for the preceding periods encompassing July through December and January through June, respectively. Submit reports to the Office of Environmental Compliance, Surveillance Division. Certify reports by a responsible company official. Clearly identify all instances of deviations from permitted monitoring requirements. For previously reported deviations, in lieu of attaching the individual deviation reports, clearly reference the communication(s)/correspondence(s) constituting the prior report, including the date the prior report was submitted. [40 CFR 70.6(a)(3)(iii)(A)]

Submit Title V excess emissions report: Due semiannually, by March 31 and September 30, unless required to submit more frequently per Part 70 General Condition R. Submit reports of all permit deviations to the Office of Environmental Compliance, Surveillance Division. Certify all reports by a responsible official in accordance with 40 CFR 70.5(d). The reports submitted on March 31 and September 30 may be consolidated with the semi-annual reports required by 40 CFR 70.6(a)(3)(iii)(A) as long as the report clearly indicates this and all required information is included and clearly delineated in the consolidated report. Unless required by an applicable reporting requirement, a written report is not required during periods in which there is no deviation. [40 CFR 70.6(a)(3)(iii)(B)]

Submit Title V compliance certification: Due annually, by the 31st of March. Submit to the Office of Environmental Compliance; Surveillance Division. [40 CFR 70.6(c)(5)(iv)]

Permittee shall comply with the Part 70 General Conditions as set forth in LAC 33:III.535 and the Louisiana General Conditions as set forth in LAC 33:III.537. [LAC 33:III.535, LAC 33:III.537]

General Information

AI ID: 2083 Union Carbide Corp - St Charles Operations

Activity Number: PER20070043

Permit Number: 2104-V2

Air - Title V Regular Permit Renewal

Also Known As:	ID	Name	User Group	Start Date
	2520-00001	Union Carbide Corp - Taft Star Plant	CDS Number	01-03-1990
13-1421730		Federal Tax ID	Federal Tax ID	11-21-1999
LAD041581422		Union Carbide Corp SCO Taft/Star	Hazardous Waste Notification	08-18-1980
PMT/PC		GPRAS Baselines	Hazardous Waste Permitting	10-01-1997
LAD041581422		Union Carbide	Inactive & Abandoned Sites	06-08-1981
LA00000191		LPDES #	LPDES Permit #	05-22-2003
LAR10C313		LPDES #	LPDES Permit #	12-12-2004
LAR10C447		LPDES #	LPDES Permit #	12-12-2004
		Priority 1 Emergency Site	Priority 1 Emergency Site	07-18-2006
LA-2163-L01		Radioactive Material License	Radiation License Number	07-06-2001
2163		X-Ray Registration Number	Radiation X-ray Registration Number	11-21-1999
GD-089-1324		Site ID #	Solid Waste Facility No.	04-30-2001
17809		Union Carbide Chemicals & Plastics	TEMPO Merge	10-17-2001
19135		Dow Union Carbide - St Charles Operations	TEMPO Merge	06-30-2002
34610		Union Carbide Corp - Hahnville Plant	TEMPO Merge	10-17-2001
35033		Union Carbide Corp - Star Plant	TEMPO Merge	07-15-2001
3632		Union Carbide Corp	TEMPO Merge	11-01-2000
38779		Union Carbide Corp	TEMPO Merge	07-15-2001
38780		Union Carbide Corp	TEMPO Merge	07-15-2001
38882		Union Carbide Corp	TEMPO Merge	07-22-2001
44303		Union Carbide Corp Taft Plant	TEMPO Merge	07-22-2001
45881		Union Carbide Chemical & Plastics	TEMPO Merge	09-05-2001
8533		Union Carbide	TEMPO Merge	11-07-2001
89428		Dow Chemical	TEMPO Merge	10-17-2001
9651		Union Carbide Star	Toxic Release Inventory	07-30-2004
70057NNCRBHWY31		TRI #	UST Facility ID (from UST legacy data)	10-12-2002
45011610		UST Facility ID (from UST legacy data)	UST FID #	

Main Phone: 9857834411

Physical Location:

355 Hwy 3142 Gated 28
Taft, LA 70057

Mailing Address:

PO Box 50
Hahnville, LA 700570050

Location of Front Gate: 29.982289 latitude, -90.455622 longitude. Coordinate Method: Lat/Long - DMS. Coordinate Datum NADB3

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General Information**AI ID:** 2083 Union Carbide Corp - St Charles Operations**Activity Number:** PER20070043**Permit Number:** 2104-V2**Air - Title V Regular Permit Renewal**

Related People:	Name	Mailing Address	Phone (Type)	Relationship
	Tim Brady	PO Box 50 Hahnville, LA 700570050	BRADYTD@DOW.C	Emission Inventory Contact for
	Tim Brady	PO Box 50 Hahnville, LA 700570050	9857834813 (WP)	Emission Inventory Contact for
	Responsible Care Leader	PO Box 50 Hahnville, LA 700570050	9857834411 (WP)	Responsible Official for
	Responsible Care Leader	PO Box 50 Hahnville, LA 700570050	9857834411 (WP)	Air Permit Contact For
	Barry Minnich	PO Box 50, Hahnville, LA 700570050	9856333446 (WP)	Kairina Response Contact for
	Steve Robinson	PO Box 50, Hahnville, LA 700570050	9857834642 (WP)	Radiation Safety Officer for

Related Organizations:	Name	Address	Phone (Type)	Relationship
	Union Carbide Corp	PO Box 50 Hahnville, LA 700570050		Operates
	Union Carbide Corp	PO Box 50 Hahnville, LA 700570050		Owns
	Union Carbide Corp	PO Box 50 Hahnville, LA 700570050		Radiation Registration Billing Party for
	Union Carbide Corp	PO Box 50 Hahnville, LA 700570050		Water Billing Party for
	Union Carbide Corp	PO Box 50 Hahnville, LA 700570050		Emission Inventory Billing Party
	Union Carbide Corp	PO Box 50 Hahnville, LA 700570050		Solid Waste Billing Party for
	Union Carbide Corp	PO Box 50 Hahnville, LA 700570050		Radiation License Billing Party for
	Union Carbide Corp	PO Box 50 Hahnville, LA 700570050		Accident Prevention Billing Party for
	Union Carbide Corp	PO Box 50 Hahnville, LA 700570050		UST Billing Party for
	Union Carbide Corp	PO Box 50 Hahnville, LA 700570050		Air Billing Party for

Note: This report entitled "General Information" contains a summary of facility-level information contained in LDEQ's TEMPO database for this facility and is not considered a part of the permit. Please review the information contained in this document for accuracy and completeness. If any changes are required or if you have questions regarding this document, you may contact Ms. Tommie Milam, Permit Support Services Division, at (225) 219-3259 or email your changes to facupdate@la.gov.